

SHARP SERVICE MANUAL

No. S1308XL55/III

MICRO COMPONENT SYSTEM

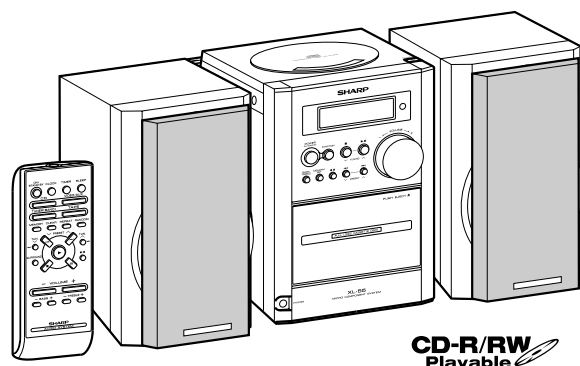


Illustration XL-55

COMPACT
disc
DIGITAL AUDIO

MODEL XL-55

XL- 55 Micro Component System consisting of XL- 55 (main unit) and CP- XL55 (speaker system).

MODEL XL-55C

XL- 55C Micro Component System consisting of XL- 55C (main unit) and CP- XL55 (speaker system).

• In the interests of user-safety the set should be restored to its original condition and only parts identical to those specified should be used.

CONTENTS

	Page
IMPORTANT SERVICE NOTES (FOR U.S.A. ONLY)	2
SPECIFICATIONS	2
NAMES OF PARTS	3
DISASSEMBLY	4
REMOVING AND REINSTALLING THE MAIN PARTS	5
ADJUSTMENT	7
TEST MODE	8
ERROR LIST	12
NOTES ON SCHEMATIC DIAGRAM	13
TYPES OF TRANSISTOR AND LED	13
BLOCK DIAGRAM	14
SCHEMATIC DIAGRAM	18
WIRING SIDE OF P.W.BOARD	25
WAVEFORMS OF CD CIRCUIT	30
TROUBLESHOOTING	31
FUNCTION TABLE OF IC	37
LCD SEGMENT	44
PARTS GUIDE/EXPLODED VIEW	
PACKING OF THE SET (FOR U.S.A. ONLY)	

FOR A COMPLETE DESCRIPTION OF THE OPERATION OF THIS UNIT, PLEASE REFER TO THE OPERATION MANUAL.

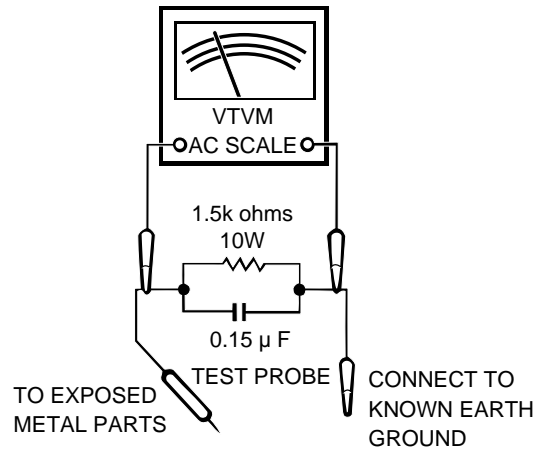
IMPORTANT SERVICE NOTES (FOR U.S.A. ONLY)

BEFORE RETURNING THE AUDIO PRODUCT

(Fire & Shock Hazard)

Before returning the audio product to the user, perform the following safety checks.

1. Inspect all lead dress to make certain that leads are not pinched or that hardware is not lodged between the chassis and other metal parts in the audio product.
2. Inspect all protective devices such as insulating materials, cabinet, terminal board, adjustment and compartment covers or shields, mechanical insulators etc.
3. To be sure that no shock hazard exists, check for leakage current in the following manner.
 - * Plug the AC line cord directly into a 120 volt AC outlet.
 - * Using two clip leads, connect a 1.5k ohm, 10 watt resistor paralleled by a 0.15μF capacitor in series with all exposed metal cabinet parts and a known earth ground, such as conduit or electrical ground connected to earth ground.
 - * Use a VTVM or VOM with 1000 ohm per volt, or higher, sensitivity to measure the AC voltage drop across the resistor (See diagram).
 - * Connect the resistor connection to all exposed metal parts having a return path to the chassis (antenna, metal cabinet, screw heads, knobs and control shafts, escutcheon, etc.) and measure the AC voltage drop across the resistor.



All check must be repeated with the AC line cord plug connection reversed.

Any reading of 0.3 volt RMS (this corresponds to 0.2 milliamp. AC.) or more is excessive and indicates a potential shock hazard which must be corrected before returning the audio product to the owner.

SPECIFICATIONS

■ General

Power source	AC 120 V, 60 Hz
Power consumption	48 W
Dimensions	Width: 6-5/16" (160 mm) Height: 9-1/2" (240 mm) Depth: 11-11/16" (296 mm)
Weight	7.9 lbs. (3.6 kg)

■ Amplifier (Except for Canada)

Output power	20 watts minimum RMS per channel into 4 ohms from 100 Hz to 20 kHz, 10% total harmonic distortion
Output terminals	Speakers: 4 ohms Headphones: 16 - 50 ohms (recommended: 32 ohms) CD digital output (optical) Subwoofer (Audio signal): 500 mV/47 k ohms
Input terminals	Video/Auxiliary (audio signal): 500 mV/47 k ohms

■ Amplifier (For Canada)

Output power	RMS: 40 W (20 W + 20 W) (10 % T.H.D.)
Output terminals	Speakers: 4 ohms Headphones: 16 - 50 ohms (recommended: 32 ohms) CD digital output (optical) Subwoofer (Audio signal): 500 mV/47 k ohms
Input terminals	Video/Auxiliary (audio signal): 500 mV/47 k ohms

■ Tuner

Frequency range	FM: 87.5 - 108 MHz AM: 530 - 1,720 kHz
------------------------	---

■ CD player

Type	Compact disc player
Signal readout	Non-contact, 3-beam semiconductor laser pickup
D/A converter	1-bit D/A converter
Frequency response	20 - 20,000 Hz
Dynamic range	90 dB (1 kHz)

■ Cassette deck

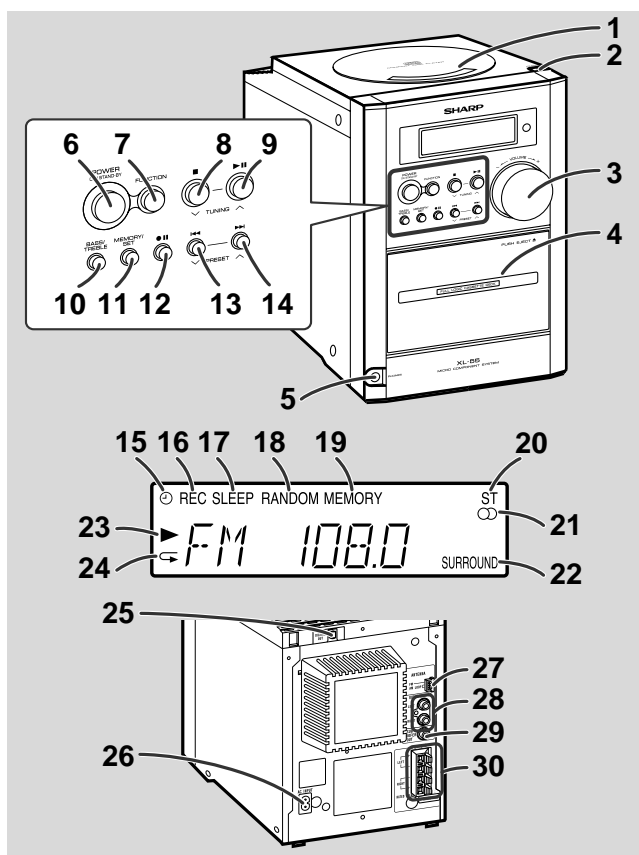
Frequency response	50 - 14,000 Hz (normal tape)
Signal/noise ratio	50 dB (recording/playback)
Wow and flutter	0.25 % (WRMS)

■ Speaker

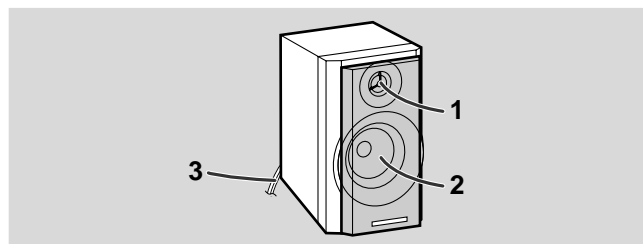
Type	2-way type speaker system Tweeter 4" (10 cm) Woofer
Maximum input power	40 W
Rated input power	20 W
Impedance	4 ohms
Dimensions	Width: 6-5/16" (160 mm) Height: 9-1/2" (240 mm) Depth: 7-7/8" (200 mm)
Weight	4.7 lbs. (2.1 kg)/each

Specifications for this model are subject to change without prior notice.

NAMES OF PARTS

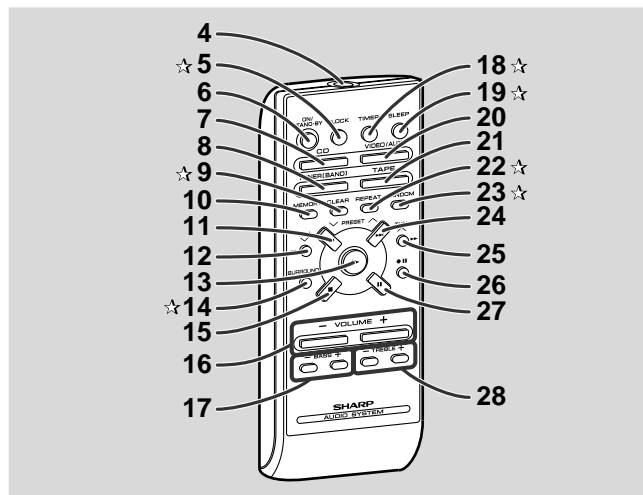
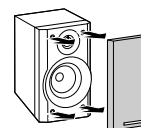


1. CD Compartment
2. CD Eject Button
3. Volume Control
4. Cassette Compartment
5. Headphone Jack
6. Power On/Stand-by Button
7. Function Selector Button
8. CD or Tape Stop, Tuning Down Button
9. CD Play or Pause, Tape Play, Tuning Up Button
10. Bass/Treble Selector Button
11. Memory/Set Button
12. Tape Record Pause Button
13. CD Track Down or Fast Reverse, Tape Rewind, Tuner Preset Down Button
14. CD Track Up or Fast Forward, Tape Fast Forward, Tuner Preset Up Button
15. Timer Play Indicator
16. Tape Record Indicator
17. Sleep Indicator
18. CD Random Play Indicator
19. Memory Indicator
20. FM Stereo Mode Indicator
21. FM Stereo Receiving Indicator
22. Surround Indicator
23. CD Play Indicator
24. CD Repeat Play Indicator
25. CD Digital Output Jack
26. AC Power Input Jack
27. FM/AM Loop Antenna Jack
28. Video/Auxiliary (Audio Signal) Input Jacks
29. Subwoofer Output Jack
30. Speaker Terminals



1. Tweeter
2. Woofer
3. Speaker Wire

Speaker grilles are removable:
Make sure nothing comes into contact with the speaker diaphragms when you remove the speaker grilles.



Buttons with "*" mark in the illustration can be operated on the remote control only.

4. Remote Control Transmitter
5. Clock Button
6. Power On/Stand-by Button
7. CD Button
8. Tuner and Band Selector Button
9. Clear Button
10. Memory Button
11. CD Track Down, Tuner Preset Down Button
12. CD Fast Reverse, Tuning Down, Tape Rewind Button
13. CD or Tape Play Button
14. Surround Button
15. CD or Tape Stop Button
16. Volume Up and Down Buttons
17. Bass Up and Down Buttons
18. Timer Button
19. Sleep Button
20. Video/Auxiliary Button
21. Tape Button
22. Repeat Button
23. Random Button
24. CD Track Up, Tuner Preset Up Button
25. CD Fast Forward, Tuning Up, Tape Fast Forward Button
26. Tape Record Pause Button
27. CD Pause Button
28. Treble Up and Down Buttons

DISASSEMBLY

Caution on Disassembly

Follow the below-mentioned notes when disassembling the unit and reassembling it, to keep it safe and ensure excellent performance:

1. Take cassette tape and compact disc out of the unit.
2. Be sure to remove the power supply plug from the wall outlet before starting to disassemble the unit.
3. Take off nylon bands or wire holders where they need to be removed when disassembling the unit. After servicing the unit, be sure to rearrange the leads where they were before disassembling.
4. Take sufficient care on static electricity of integrated circuits and other circuits when servicing.

STEP	REMOVAL	PROCEDURE	FIGURE
1	Top Cabinet	1. Screw (A1) x5 2. Socket (A2) x2	4-1 4-1,3
2	Side Panel(Left/Right)	1. Screw (B1) x4	4-1
3	Rear Panel	1. Screw (C1) x2 2. Screw (C2) x2	4-1 4-2
4	Power Amp. PWB	1. Screw (D1) x1 2. Socket (D2) x1 3. Socket (D3) x1	4-2
5	Main PWB/ Headphones PWB	1. Screw (E1) x4 2. Socket (E2) x4 3. Socket (E3) x1	4-3
6	Front Panel	1. Screw (F1) x2 2. Socket (F2) x2	4-4
7	Power PWB	1. Screw (G1) x2 2. Shield Cover (G2) x1 3. Screw (G3) x5	4-4
8	Tape Mechanism	1. Screw (H1) x4	4-5
9	Display PWB	1. Knob (J1) x1 2. Screw (J2) x8	4-5
10	CD PWB(Note)/ Open Close Switch PWB Jack PWB	1. Screw (K1) x4 2. Screw (K2) x2 3. Socket (K3) x3	5-1
11	CD Mechanism	1. Screw (L1) x3	5-2

Note:

After removing the connector for the optical pickup from the connector, wrap the conductive aluminium foil around the front end of the connector so as to protect the optical pickup from electro-static damage.

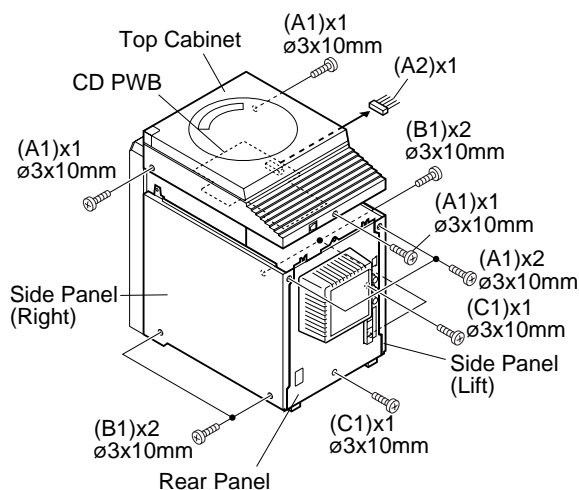


Figure 4-1

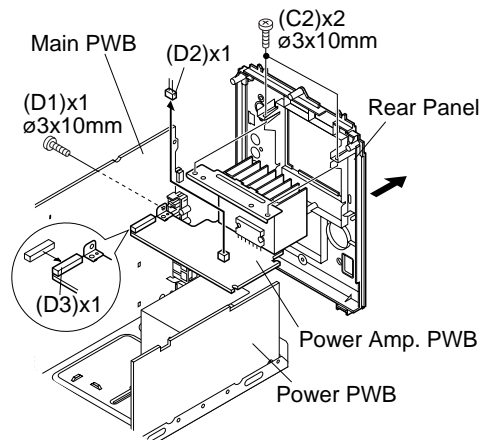


Figure 4-2

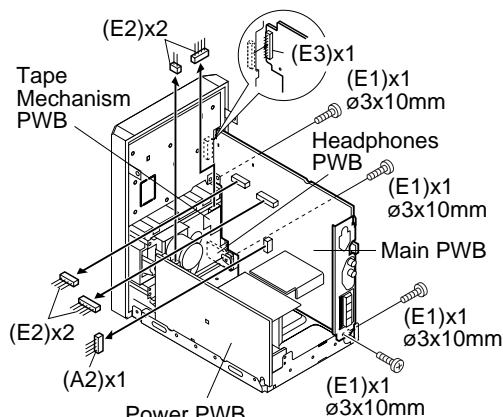


Figure 4-3

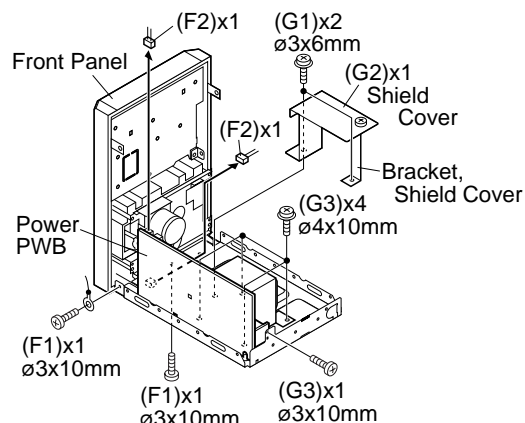


Figure 4-4

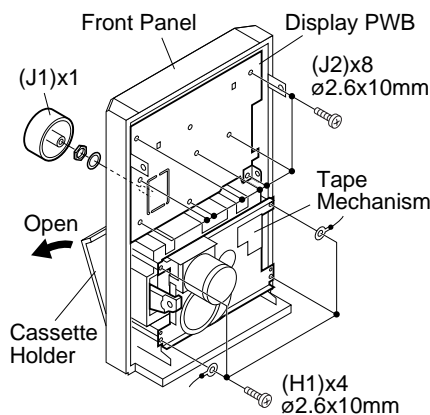


Figure 4-5

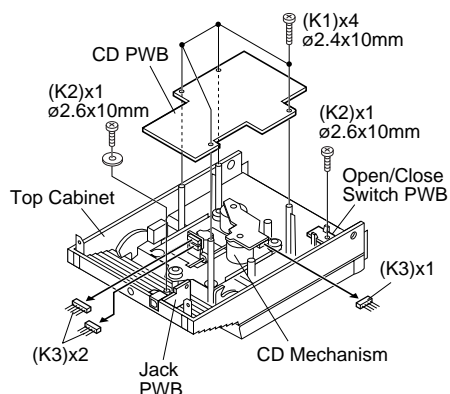


Figure 5-1

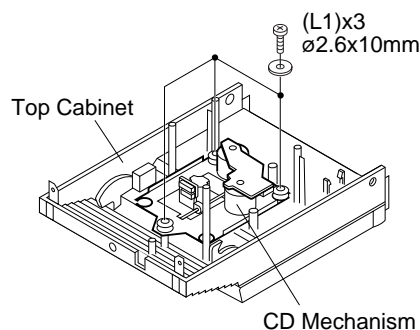


Figure 5-2

REMOVING AND REINSTALLING THE MAIN PARTS

TAPE MECHANISM SECTION

Perform steps 1 to 6 and 8 of the disassembly method to remove the tape mechanism. (See page 4.)

How to remove the record / playback and erase heads (See Fig. 5-3.)

1. Remove the screws (A1) x 2 pcs., to remove the erase head.
2. Remove the screws (A2) x 2 pcs., to remove the record/playback head.

Note:

After replacing the heads and performing the azimuth adjustment, be sure to apply screwlock.

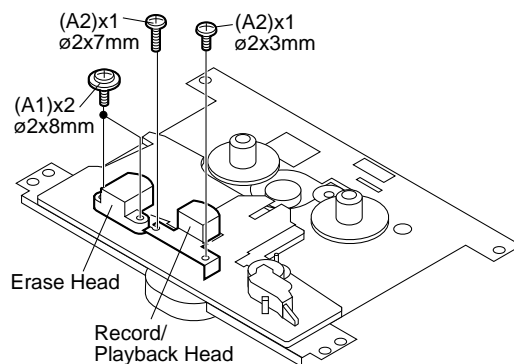


Figure 5-3

How to remove the pinch roller (See Fig. 5-4.)

1. Carefully bend the pinch roller pawl in the direction of the arrow <A>, and remove the pinch roller (B1) x 1 pc., upwards.

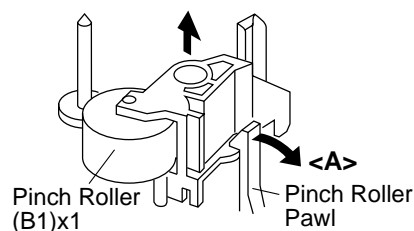


Figure 5-4

How to remove the belts (See Fig. 5-5.)

1. Remove the main belt (C1) x 1 pc., from the motor pulley.
2. Remove the FF/REW belt (C2) x 1 pc., from the REW/FF roller.
3. Put on the belts in the reverse order of removal.

Note:

When putting on the belt, ascertain that the belt is not twisted, and clean it.

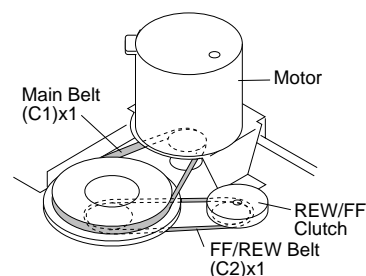


Figure 5-5

How to remove the motor (See Fig. 5-6.)

1. Remove the main belt.
2. Remove the screws (D1) x 2 pcs., to remove the motor bracket.
3. Remove the screws (D2) x 3 pcs., to remove the motor.

Note:

When mounting the motor, pay attention to the motor mounting angle.

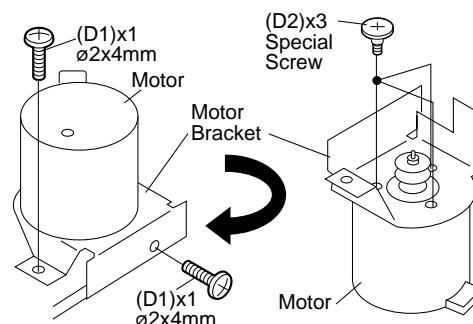


Figure 5-6

How to remove the flywheel (See Fig. 6-1.)

1. Remove the belt.
2. Remove the stop washer (E1) x 1 pc., with a small precision screwdriver to extract the flywheel from the capstan metal.

Note:

When the stop washer is deformed or damaged, replace it with a new one.

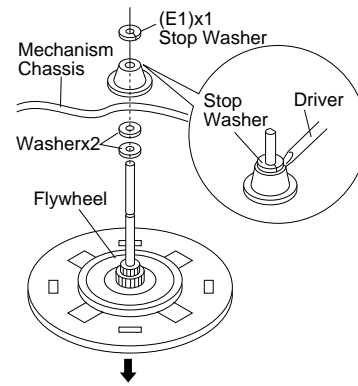


Figure 6-1

How to remove the tape mechanism PWB (See Fig. 6-2.)

1. Remove the screw (F1) x 1 pc., to remove the tape mechanism PWB.
2. Remove the screw (F2) x 1 pc.
3. Remove the solder joints (F3) x 2 pcs., to remove the tape mechanism PWB.

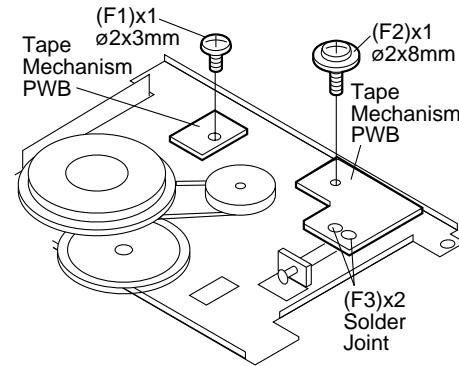


Figure 6-2

CD MECHANISM SECTION

Perform steps 1, 10 and 11 of the disassembly method to remove the CD mechanism. (See page 4.)

How to remove the pickup (See Fig. 6-3)

1. Remove the mechanism cover, paying attention to the pawls (A1) x 4 pcs.
2. Remove the screws (A2) x 2 pcs., to remove the shaft (A3) x 1 pc.
3. Remove the stop washer (A4) x 1 pc., to remove the gear (A5) x 1 pc.
4. Remove the pickup.

Note:

After removing the connector for the optical pickup from the connector, wrap the conductive aluminium foil around the front end of connector remove to protect the optical pickup from electrostatic damage.

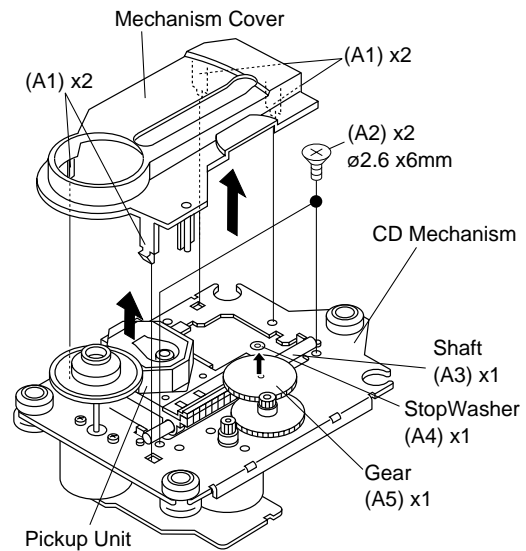


Figure 6-3

ADJUSTMENT

MECHANISM SECTION

• Driving Force Check

Torque Meter	Specified Value
Play: TW-2412	Over 80 g

• Torque Check

Torque Meter	Specified Value
Play: TW-2111	30 to 60 g. cm
Fast forward: TW-2231	55 to 140 g.cm
Rewind: TW-2231	55 to 140 g.cm

• Tape Speed

Test Tape	Adjusting Point	Specified Value	Instrument Connection
MTT-111	Variable resistor in motor.(M901)	3,000 \pm 90 Hz	Headphone terminal

TAPE MECHANISM

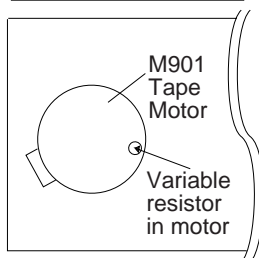


Figure 7-1 ADJUSTMENT POINT

TUNER SECTION

fL: Low-range frequency

fH: High-range frequency

• AM IF/RF

Signal generator: 400 Hz, 30%, AM modulated

Test Stage	Frequency	Frequency Display	Setting/ Adjusting Parts	Instrument Connection
IF	450 kHz	1,602 kHz	T351	*1
AM Band Coverage	—	531 kHz	(fL): T306 1.1 \pm 0.1 V	*2
AM Tracking	990 kHz	990 kHz	T302	*1

*1. Input: Antenna Output: Speaker terminal

*2. Input: Input is not connected Output: TP301

• Check FM VT

Signal generator: 1 kHz, 40 kHz dev., FM modulated

Frequency	Display	Check Point	Instrument Connection
87.5 MHz	87.5 MHz	3.4 V \pm 1.0 V	TP301
108 MHz	108 MHz	7.8 V \pm 1.0 V	TP301

• FM Mute Level

Signal generator: 1 kHz, 40 kHz dev., FM modulated

Frequency	Display	Adjusting Parts	Instrument Connection
98.00 MHz (30 dB μ V)	98.00 MHz	VR351*1	Input: CNP301 Output: Speaker Terminal

*1. Adjust so that an output signal appears.

• FM Detection

Signal generator: 10.7 MHz, FM sweep generator

Test Stage	Frequency	Frequency Display	Setting/ Adjusting Parts	Instrument Connection
FM IF	10.7 MHz	98.00 MHz	T304(Turn the core of T304 fully counter-clockwise).	Input: Pin 1 of IC301

• FM RF

Signal generator: 1 kHz, 75 kHz dev., FM modulated

Test Stage	Frequency	Frequency Display	Setting/ Adjusting Parts	Instrument Connection
FM Band Coverage	—	87.50 MHz	(fL): L303 3.4 \pm 0.1 V	*1
FM RF	98.00 MHz (10~30 dB)	98.00 MHz	L302	*2

*1. Input: Antenna, Output: TP301

*2. Input: Antenna, Output: Speaker Terminal

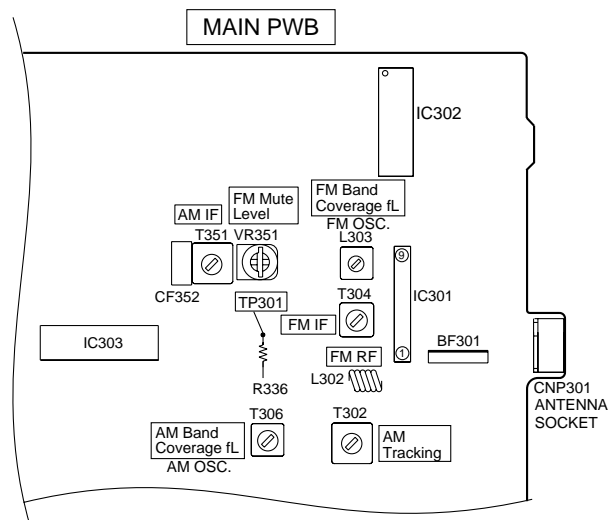


Figure 7-2 ADJUSTMENT POINTS

• Setting the Test Mode

Keeping the REW/REV button and BASS/TREBLE button pressed, turn on POWER. Then, the frequency is initially set in the memory as shown in Table. Call it with the PRESET button to use it for adjustment and check of tuner circuit.

Preset No.	FM STEREO	Preset No.	AM
1	87.50 MHz	6	531 kHz
2	108.00 MHz	7	1,602 kHz
3	98.00 MHz	8	990 kHz
4	90.00 MHz	9	603 kHz
5	106.00 MHz	10	1,404 kHz
11~25	——		

Preset No.	FM MONO
26	106.00 MHz
27	90.00 MHz
28	98.00 MHz
29	108.00 MHz
30	87.50 MHz

TEST MODE

The test mode applied to this microcomputer has three modes, namely ordinary test mode to be used for adjustment or measurement, aging test mode to be used for aging test, and self-diagnosis test mode for self-inspection in case of final product inspection.

1. Turning on the test mode

To turn on the specific test mode, press the POWER ON/STAND-BY button, holding down the following two buttons in the ordinary stand-by mode (power off state). In this case only the main unit button is valid. Even when the POWER of remote control button is set to on, the test mode is not turned on.

[Ordinary test mode]

1. CD Test Mode (TEST 1)..... BASS/TREBLE + FF/FWD
2. Tuner Test Mode (TEST 2)..... BASS/TREBLE + REW/REV
3. Electronic volume Test Mode (TEST 3)..... BASS/TREBLE + REC
4. Timer Test Mode (TEST 4)..... MEMORY/SET + REC
5. LCD Test Mode (TEST 5)..... MEMORY/SET + REW/REV

[Self-diagnosis Test Mode]

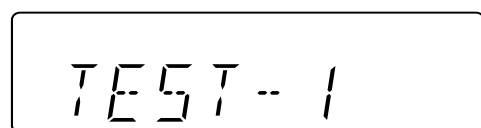
1. Button input diagnosis test mode (TEST6).... MEMORY/SET + PLAY

2. CD Test Mode (TEST 1)

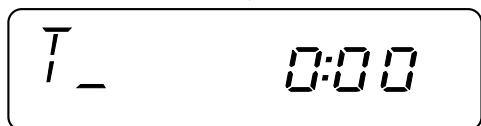
In the CD test mode the operation of each step is enabled even when the LID-SW is off. However, if focus cannot be set in step 3 or any error processing is started, it is impossible to proceed to the next step. When the error processing is started, operations other than termination of test mode by pressing the POWER ON/STAND-BY button or return to the step 1 by pressing the STOP button are inhibited.

1. Step 1 Mode

When the CD test mode is turned on, the following indication lights, the processing (until turning-off of CD STB terminal of CD initialization operation flow) is executed, and the next button input is waited.



After lighting for one second



If the following operation buttons are pressed in this state, the operation is performed as follows.

"POWER ON/STAND-BY" ... The test mode is turned off, the power is turned off, and the ordinary stand-by mode is set.

"FF/FWD" After the pickup returns once to the innermost periphery, it slides toward the outer periphery while this button is held down.

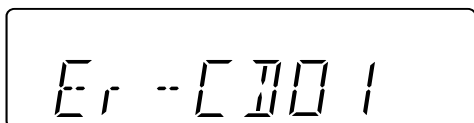
"REW/REV" After the pickup returns once to the innermost periphery, it slides toward the inner periphery while this button is pressed. However, if PU-IN is on, input is invalid.

"PLAY" Shift to step 2

"STOP" Invalid

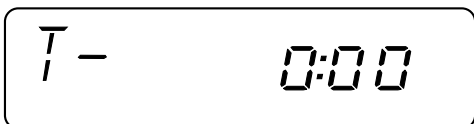
"REC PAUSE" Shift to step 5

* In case of initialization the pickup is moved toward the inner periphery. Any buttons other than POWER ON/STAND-BY button are not accepted until the shift of pickup to the inner periphery is completed at this time. If PU-IN SW ON cannot be detected within 10 seconds, the slide motor is stopped, and the following error indication appears. Press the POWER ON/STAND-BY button to end the test mode, or press the STOP button to return to step 1. Any other operations are inhibited.



2. Step 2 Mode

When the "PLAY" button is pressed in this mode, the laser lighting command LDON (8400) is sent, and the laser is turned on. Other operations are not performed.



If the following buttons are pressed in this state, the operation is performed as follows.

"POWER ON/STAND-BY" .. The test mode is turned off, the power is turned off, and the ordinary stand-by mode is set.

"FF/FWD" The pickup slides toward the outer periphery while this button is held down.

"REW/REV" The pickup slides toward the inner periphery while this button is held down. However, if PU-IN is on, input is invalid.

"PLAY" Shift to step 3

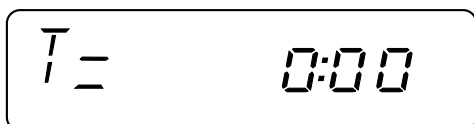
"STOP" Return to step 1

"REC PAUSE" Shift to step 5

3. Step 3 Mode

The laser is kept lighting. The processing (until turning-on of CLV servo of CD initialization operation flow) is executed, and the next button input is waited. (The focus servo is turned on, and focus search is performed.)

The focus search is repeated until the focus is set.



When the following operation buttons are pressed in this state, the operation is executed as follows.

"POWER ON/STAND-BY" .. The test mode is turned off, the power is turned off, and the ordinary standby mode is set.

"FF/FWD" The pickup slides toward the outer periphery while this button is held down.

"REW/REV" The pickup slides toward the inner periphery while this button is held down. However, if PU-IN is on, input is invalid.

"PLAY" If the focus has been set, shift to step 4 is executed. If the focus has not been set, acceptance is inhibited.

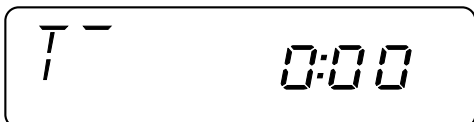
"STOP" Return to step 1

"REC PAUSE" Shift to step 5

*If the focus is disturbed after it has been set, the process returns to step 1.

4. Step 4 Mode (Only focus "OK" can make this item showing)

The CLV servo ON command (8600) sending operation is performed, and the next button input is waited. (The disc is rotated to perform CLV locking.)



The time display indicates always "0:00".

When the following buttons are pressed in this state, the operation is executed as follows.

"POWER ON/STAND-BY" .. The test mode is turned off, the power is turned off, and the ordinary standby mode is set.

"FF/FWD" The pickup slides toward the outer periphery while this button is held down.

"REW/REV" The pickup slides toward the inner periphery while this button is held down. However, if PU-IN is on, input is invalid.

"PLAY" Shift to step 5

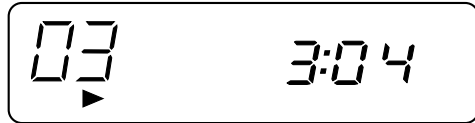
"STOP" Return to step 1

"REC PAUSE" Shift to step 5

*If the focus is disturbed, the process returns to step 1.

5. Step 5 Mode

The CD initialization operation flow is executed to the end, the mute is set to off, and playback is started. Even when the playback reaches the outermost periphery of disc, the operation does not stop. The LCD display indicates the playback past time as in case of ordinary CD playback.



When the following operation buttons are pressed in this state, the operation is executed as follows.

"POWER ON/STAND-BY" ... The test mode is turned off, the power is turned off, and the ordinary standby mode is set.

"FF/FWD" The pickup slides toward the outer periphery while this button is held down.

"REW/REV" The pickup slides toward the inner periphery while this button is held down. However, if PU-IN is on, input is invalid.

"PLAY" Invalid

"STOP" Return to step 1

*If the focus is disturbed, the process returns to step 1.

Other cautions

- TOC IL is not executed in the test mode.
- As for button operations other than those shown above, only the sound volume operation (with JOG) is accepted.

3. Tuner Test Mode (TEST 2)

1. Outline of tuner (radio) test mode

The tuner test mode is intended to store the adjustment and measurement frequencies in the preset memory CH without frequency setting by adjusting personnel when the tuner section is adjusted in the production line.

2. Details of tuner test mode

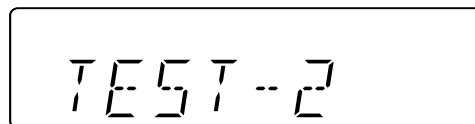
When the power is turned on by using the POWER ON/STAND-BY button while the BASS/TREBLE and REW/REV buttons are held down in POWER OFF state, the frequency for adjustment and measurement of destination specified by the AREA terminal is preset and stored in the preset memory CH. However, Ordinary 1 and Ordinary 2 are set to the designation (destination selected by SPAN switching operation) set when the test mode is obtained.(Memory/Set+Function Key Span Charged) (As for frequencies to be preset and stored for each destination, refer to item 3.)

The tuner test mode is started from preset No.1.

The operations of test mode are identical with the ordinary operations of TUNER function. However, FUNCTION switching is invalid.

Since it is necessary to discard the content of preset memory when the tuner test mode is ended, "0000" or "1111" bits are written in the memory to be checked in case of memory check (in case of initial setting) so that memory abnormality is detected in case of initial setting so as to ensure memory initialization.

When the tuner test mode is turned on, the following indication lights for one second.



- The TUNER TEST2 mode is set as a result of BASS/TREBLE+ REW/REV. -> POWER OFF -> IF AC is set to OFF in the TEST2 mode, the initial state is restored.



When POWER is set to OFF, the memory of TEST2 mode is protected.

When the power is turned on again, the ordinary operation is enabled while the data is stored in the memory (besides TUNER).



If AC OFF state is maintained in this state for about 1/2 day, start is executed in the initial state.

- To clear the whole memory, insert the AC cord, holding down MEMORY + STOP.

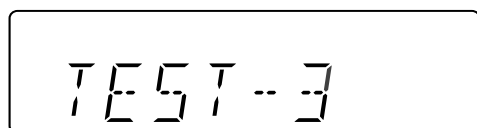
3. Preset frequencies for various destinations (random preset memory)

CH	BAND	Europe 2, 4	CH	BAND	Europe 2, 4	CH	BAND	Europe 2, 4
1	FM STEREO	FM 87.50 MHz	6	AM	AM 531 kHz	16-25	FM MONO	FM106.00 MHz FM 90.00 MHz FM 98.00 MHz FM108.00 MHz FM 87.50 MHz
2		FM108.00 MHz	7		AM1602 kHz	26		
3		FM 98.00 MHz	8		AM 990 kHz	27		
4		FM 90.00 MHz	9		AM 603 kHz	28		
5		FM106.00 MHz	10		AM1404 kHz	29		
			11-15	LW		30		

- The hatched sections of the table are not stored in memory.

4. Electronic volume Test Mode (TEST 3)

When the test mode is set, the following indication lights for one second.



When this mode is set, BASS/TREBLE is set to 0 (0 dB) and start-up function is set to CD when volume is -14 dB (STEP 23). The button operations in the test mode are the same as those of ordinary operation excepting sound volume UP/DOWN.

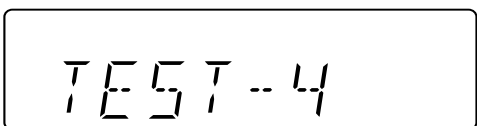
- (1) The indication is the same as that of ordinary operation excepting test mode setting.
- (2) The sound volume control with the sound volume UP/DOWN button is only the following 3 steps unlike the ordinary state.

Volume- ∞ (STEP 0) <-> Volume-14 dB (STEP 23) <-> Volume-0 (STEP 30)

- (3) BASS/TREBLE is switched when button operation is performed.

5. Timer test Mode (TEST 4)

When the test mode is set, the following indication lights for one second.

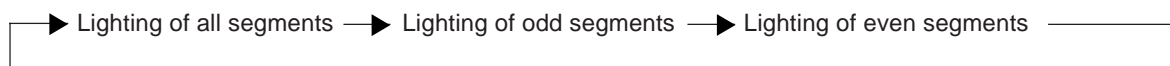


The current time and timer time are set in the following procedure to perform the timer playback.

1. Set the current time to 1:00, set the timer to ON time 1:05, set the function to Aux, and set volume STEP 12. One minute is counted as one second, and the timer playback operation is performed. The fade-in (when playback is started) is executed at a rate of one step for 1 sec. After completion of fade-in the fade-out is executed at a rate of one step for 1 sec (WAIT 1 sec inserted). After completion of fade-out the power is turned off (after WAIT 1 sec), and the mode is changed to the standby mode. The indication during operation is the same as that of ordinary timer operation.

6. LCD Test Mode (TEST 5)

When the LCD test mode is set, all the LCD segments are lighted. After that the indication is changed as follows according to the "PLAY" button input.



7. Key input diagnosis Test Mode (TEST 6)

When the test mode is set, the following indication appears.

TEST-6

This test mode is intended to check whether all the main unit buttons can be detected. Accordingly, in this test mode checking as to whether the "POWER ON/STAND-BY" button was pressed after all the buttons shown below were pressed is performed. If the result is OK, OK is indicated. Even any one of keys was not pressed, an error is indicated. In case of OK termination or error termination exit from this mode occurs when the "POWER ON/STAND-BY" button is pressed next time, and the standby mode is set.

1. In case of "MEMORY/SET" + "PLAY" + "POWER ON/STAND-BY"

Since SURROUND and RDS are not provided, the following 9 buttons are detected as all buttons.

PLAY, POWER ON/STAND-BY, BAND, BASS/TREBLE, FUNCTION, MEMORY/SET, REC PAUSE, REW, FF, STOP.

The OK/NG indication of test result is as follows.

ERROR

OK

ERROR LIST

PU-IN SW detection error

Er - CD01

Error content The detection SW cannot detect ON after a fixed period of time even if the microcomputer controls the CD pickup to return to the innermost position.

Probable cause Defective or poorly connected PU-IN SW or slide motor.

Action Solve the problem and turn on the power again.

CD read error

CD Error

Error content Disc data cannot be read properly or even if it can be read, the disc is not a playable one.

Probable cause The disc is loaded upside down, not CD-DA, scratches, stains, etc.

Action Open the CD lid, then reload the disc correctly. Remove the scratches or stains on the disc.

NO DISC

no disc

Error content Focusing is impossible.

Probable cause The disc is loaded upside down, not CD-DA, scratches, stains, etc.

Action Open the CD lid, then reload the disc correctly. Remove the scratches or stains on the disc.

Tape mechanism error 1

Er - TA00

Error content The detection SW "CAM-SW" cannot detect ON (mechanism in operation) even if the motor and solenoid are controlled to play back, fast forward, rewind, or record the tape.

Probable cause Mechanism is in operation when this message appears: Defective or poorly connected CAM-SW. Mechanism stops: Defective or poorly connected motor or solenoid.

Action Solve the problem and turn on the power again.

Tape mechanism error 2

Er - TA01

Error content Initialization cannot be completed when the microcomputer controls the motor and solenoid to initialize the tape mechanism (to set the mechanism to the stop mode). The detection SW "CAM-SW" cannot detect OFF While the mechanism is in operation.

Probable cause Mechanism is in operation when this message appears: Defective or poorly connected CAM-SW. Mechanism stops: Defective or poorly connected motor or solenoid.

Action Solve the problem and turn on the power again.

NOTES ON SCHEMATIC DIAGRAM

- **Resistor:**
To differentiate the units of resistors, such symbol as K and M are used: the symbol K means 1000 ohm and the symbol M means 1000 kohm and the resistor without any symbol is ohm-type resistor. Besides, the one with "Fusible" is a fuse type.
- **Capacitor:**
To indicate the unit of capacitor, a symbol P is used: this symbol P means micro-micro-farad and the unit of the capacitor without such a symbol is microfarad. As to electrolytic capacitor, the expression "capacitance/withstand voltage" is used.
(CH), (TH), (RH), (UJ): Temperature compensation
(ML): Mylar type
(P.P.): Polypropylene type
- Schematic diagram and Wiring Side of P.W.Board for this model are subject to change for improvement without prior notice.
- The indicated voltage in each section is the one measured by Digital Multimeter between such a section and the chassis with no signal given.
 1. In the tuner section,
() indicates AM
< > indicates FM stereo
 2. In the main section, a tape is being played back.
 3. In the deck section, a tape is being played back.
() indicates the record state.
 4. In the power section, a tape is being played back.
 5. In the CD section, the CD is stopped.
- Parts marked with "⚠" (□ = □ □ □) are important for maintaining the safety of the set. Be sure to replace these parts with specified ones for maintaining the safety and performance of the set.

REF. NO	DESCRIPTION	POSITION
SW700	VOLUME	ON—OFF
SW701	POWER ON/STAND-BY	ON—OFF
SW702	FUNCTION	ON—OFF
SW703	STOP/CLEAR, TUNING DOWN	ON—OFF
SW704	PLAY/CD PAUSE, TUNING UP	ON—OFF
SW705	BASS/TREBLE	ON—OFF
SW706	MEMORY/SET	ON—OFF

REF. NO	DESCRIPTION	POSITION
SW707	REC/PAUSE	ON—OFF
SW708	REW/PRESET DOWN	ON—OFF
SW709	FF/PRESET UP	ON—OFF
SW800	PICKUP IN	ON—OFF
SW801	CD LID OPEN/CLOSE	ON—OFF
SW901	FOOL PROOF	ON—OFF
SW902	CAM	ON—OFF

TYPES OF TRANSISTOR AND LED

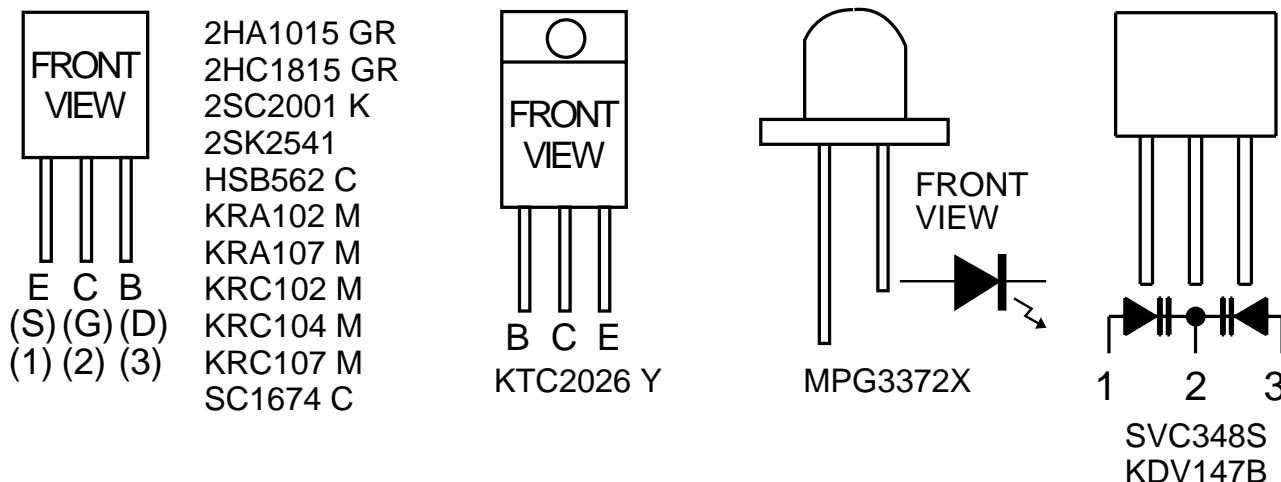
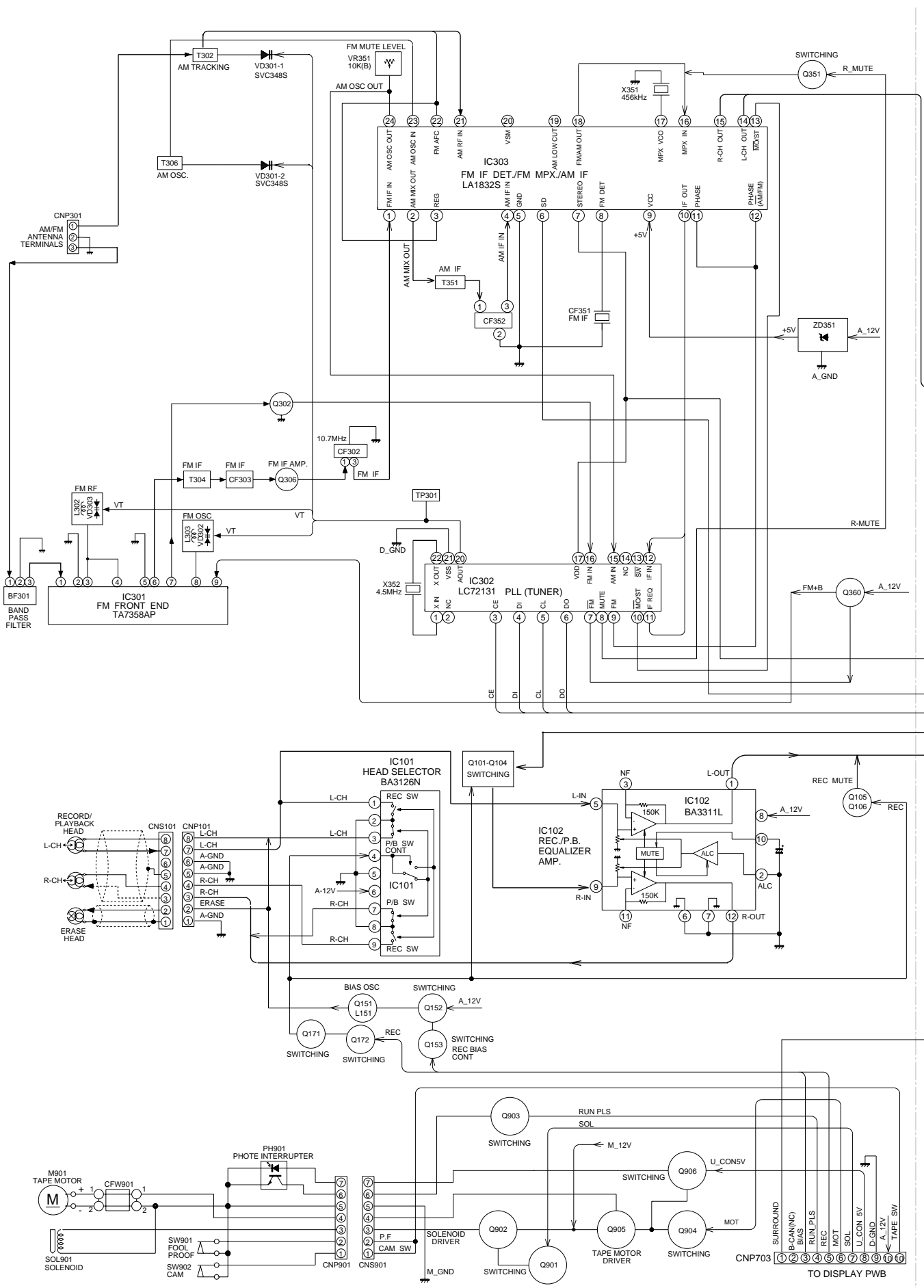


Figure 13 TYPES OF TRANSISTOR AND LED



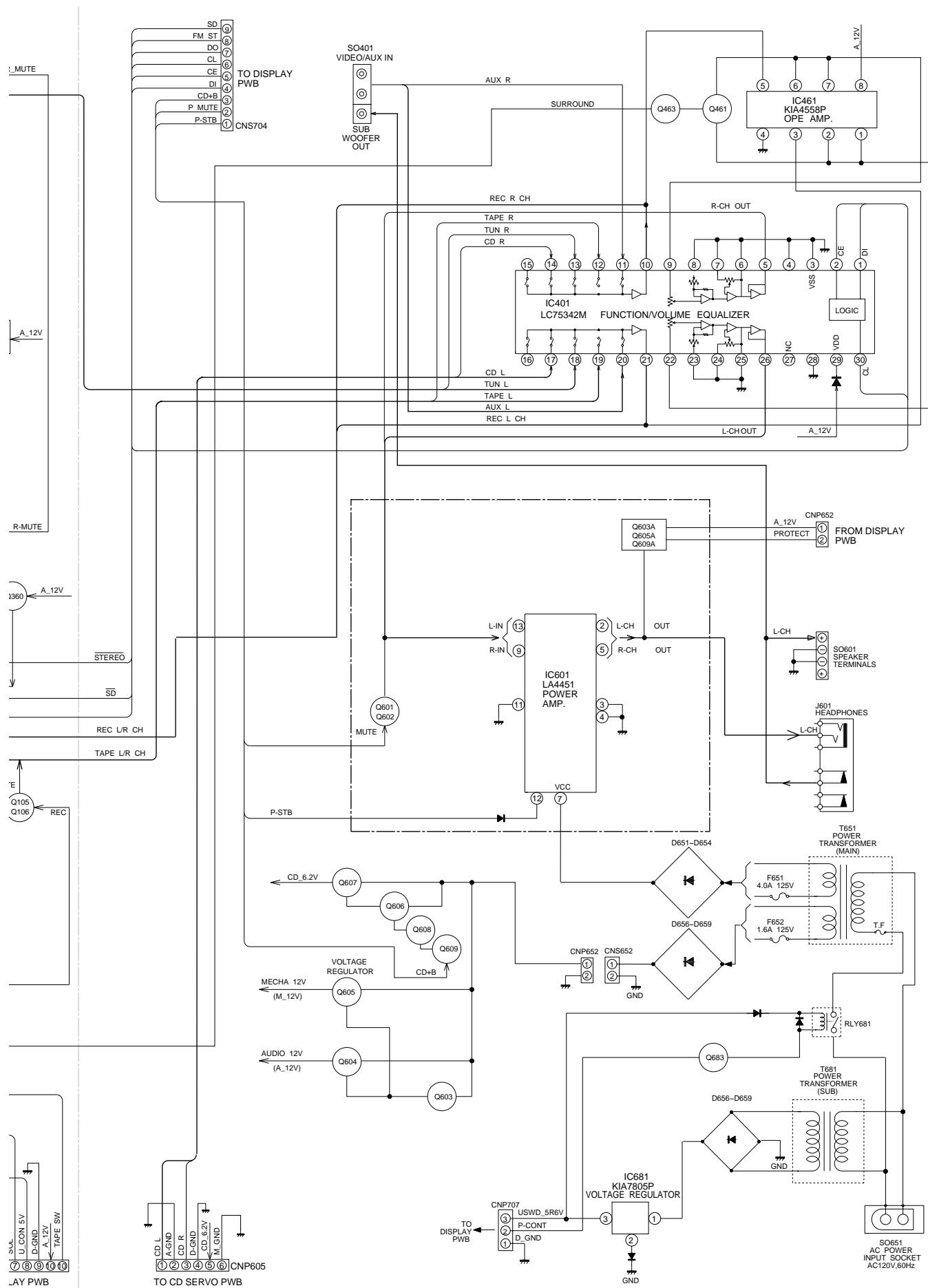


Figure 15 BLOCK DIAGRAM (2/4)

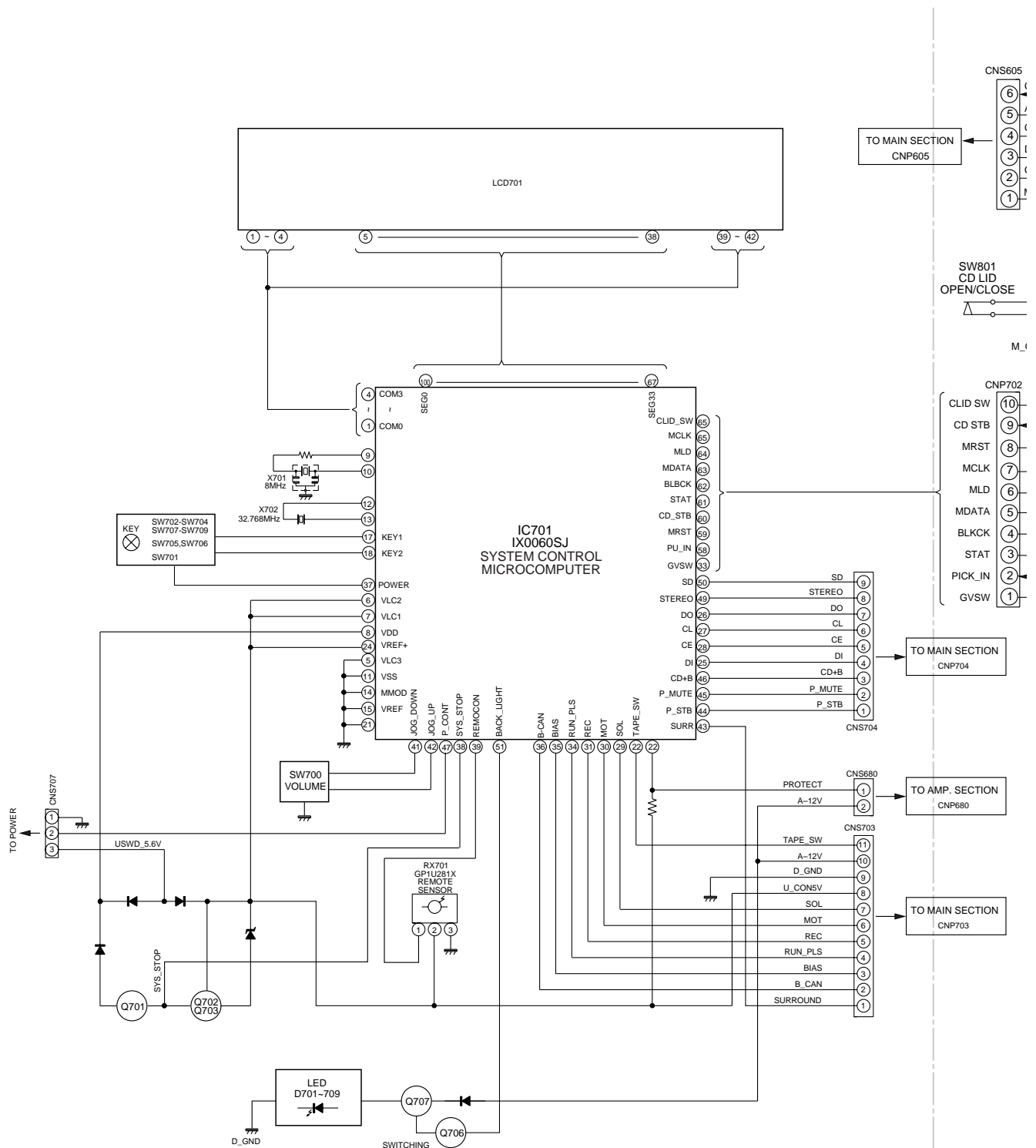


Figure 16 BLOCK DIAGRAM (3/4)

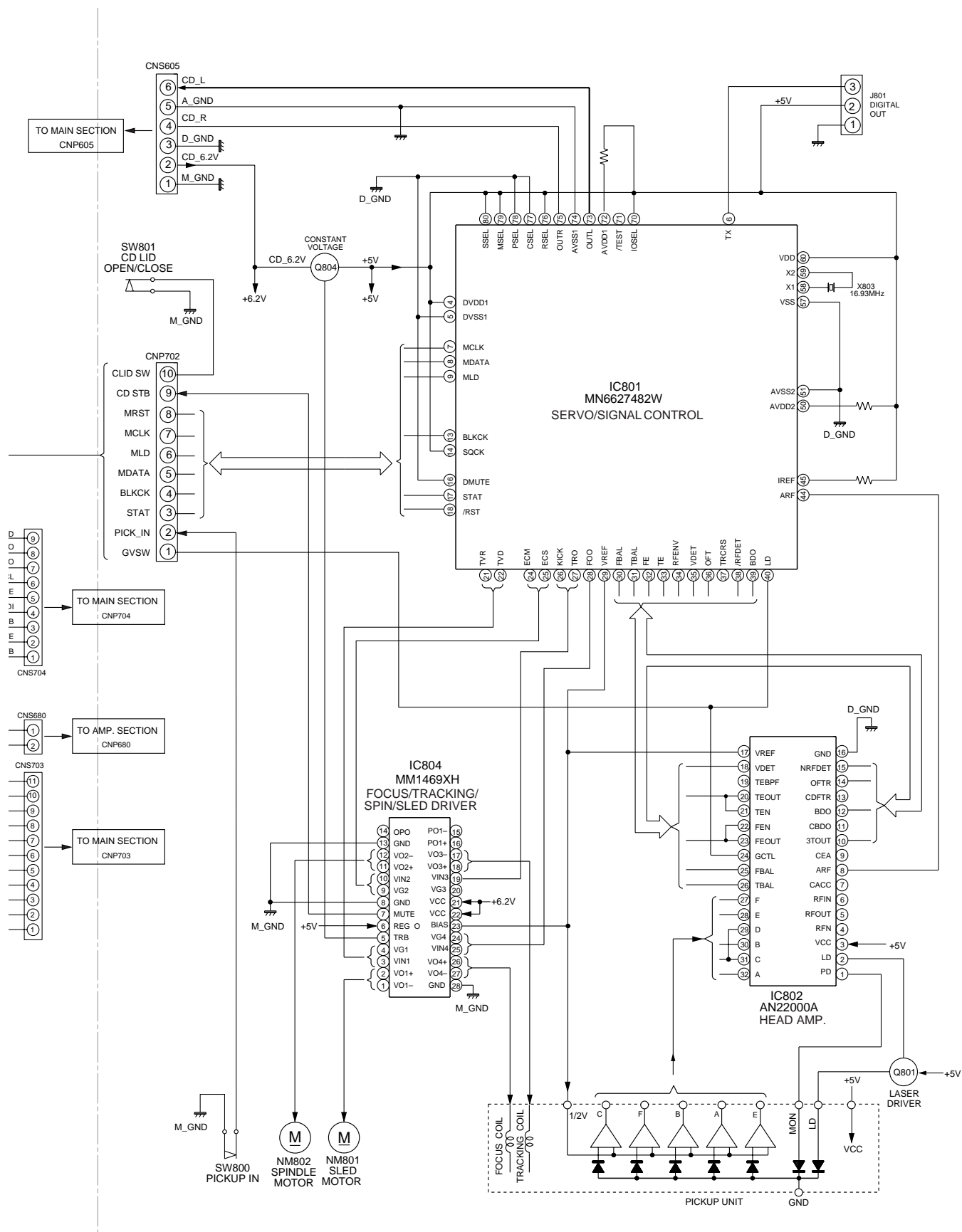


Figure 17 BLOCK DIAGRAM (4/4)

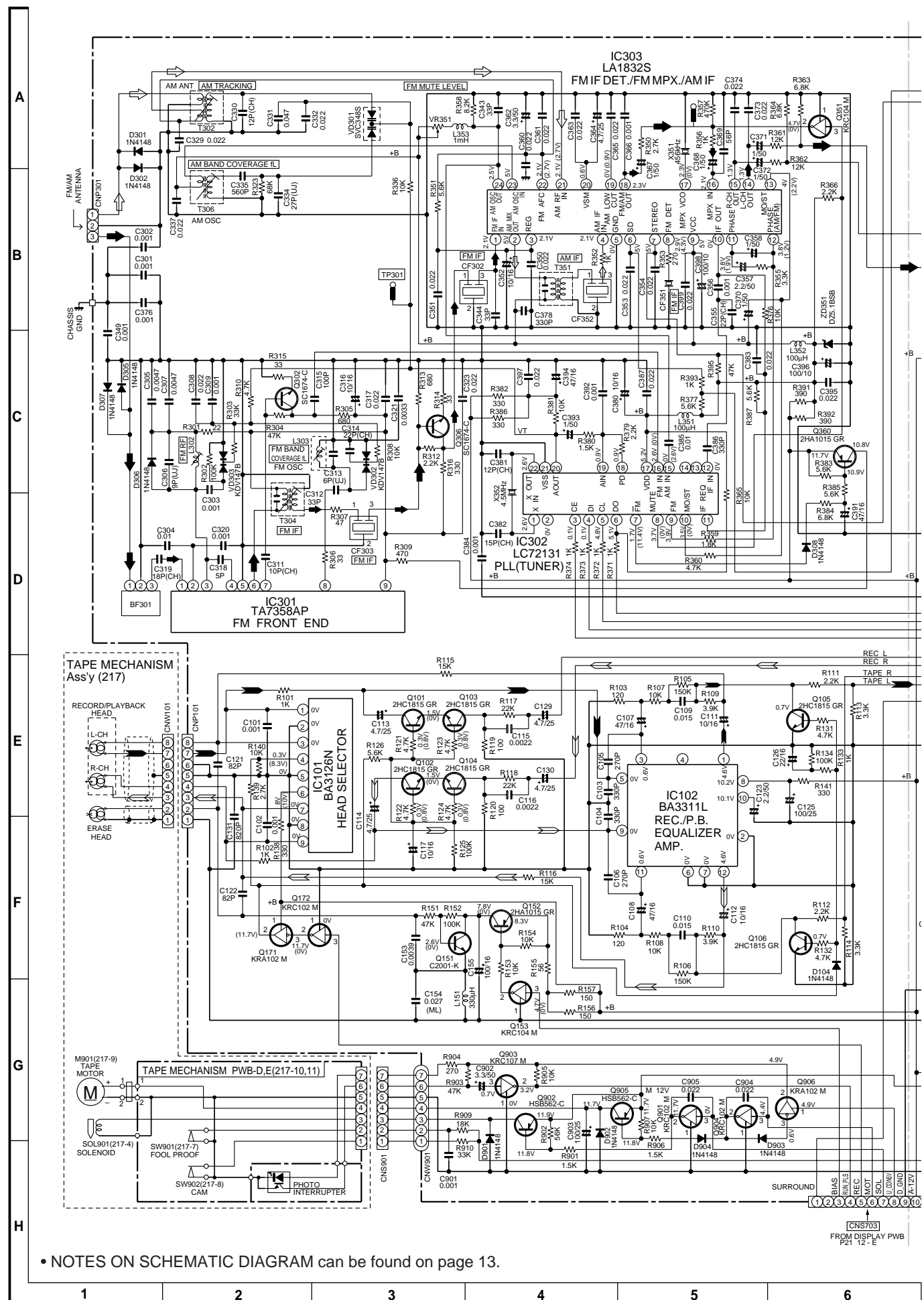
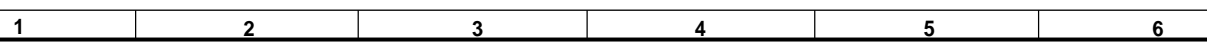


Figure 18 SCHEMATIC DIAGRAM (1/7)

- 19 -



- 20 -

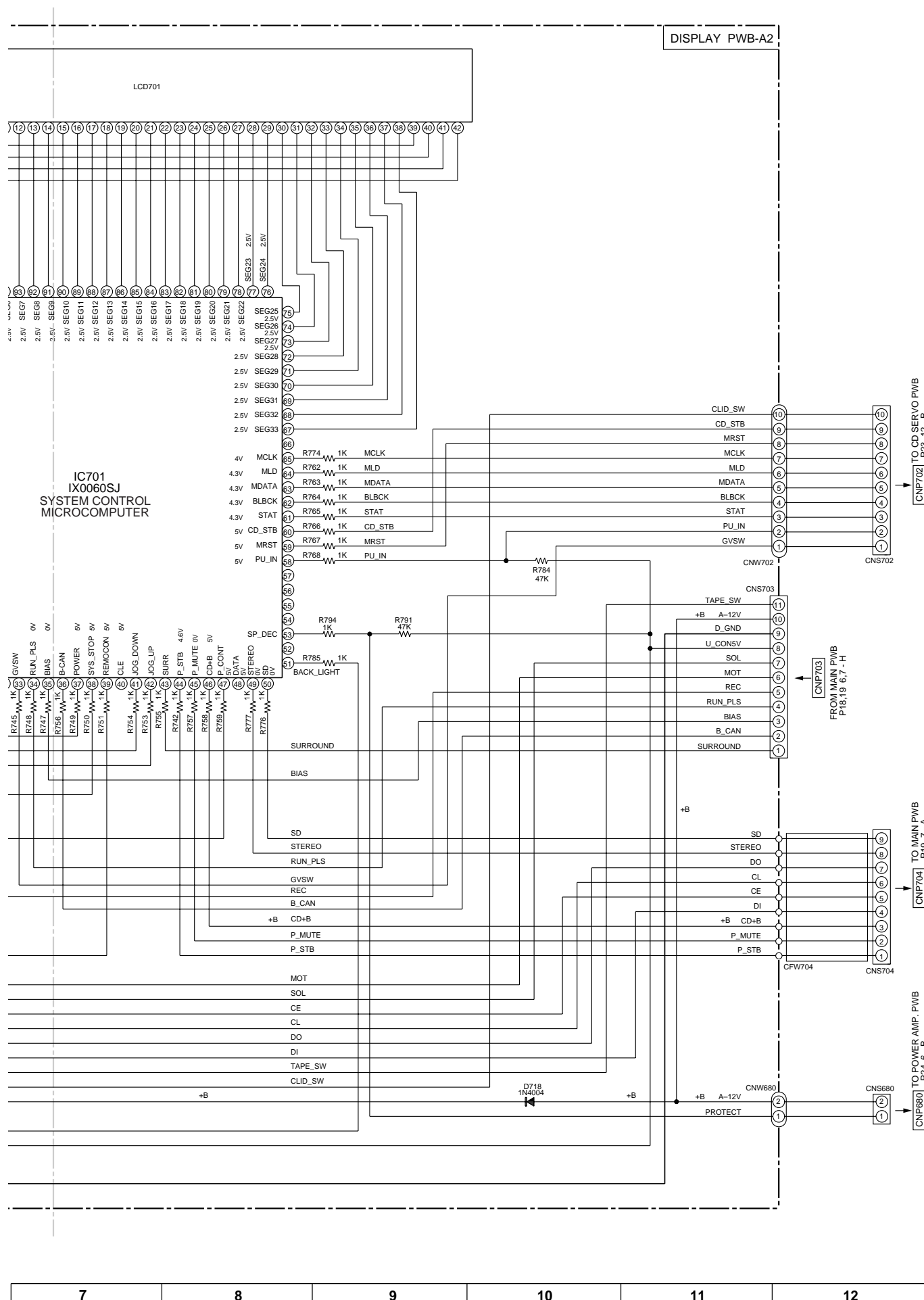
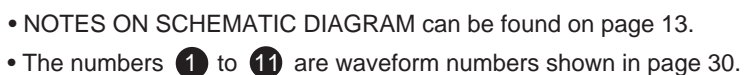


Figure 21 SCHEMATIC DIAGRAM (4/7)



- 22 -

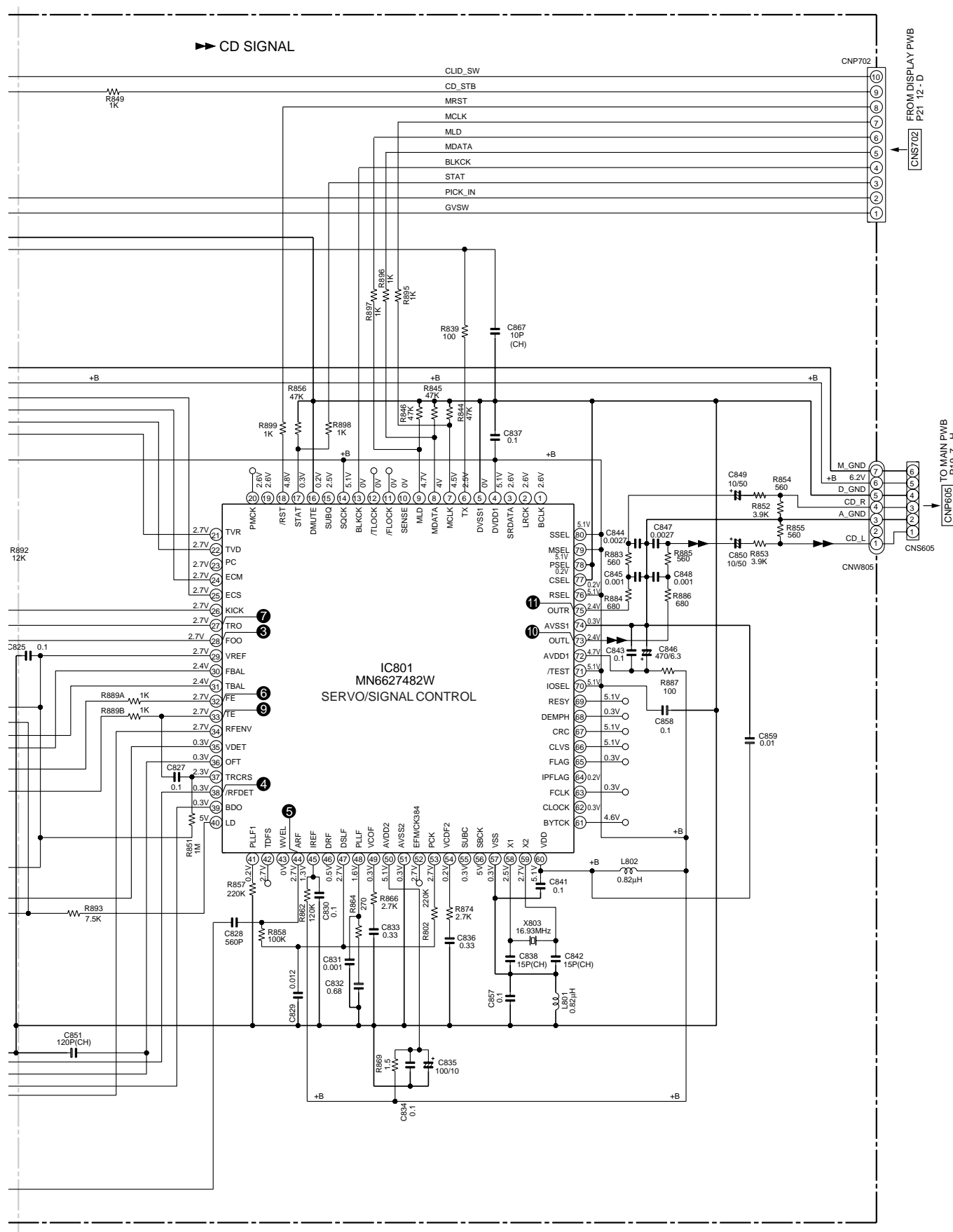


Figure 23 SCHEMATIC DIAGRAM (6/7)

Figure 24 SCHEMATIC DIAGRAM (7/7)

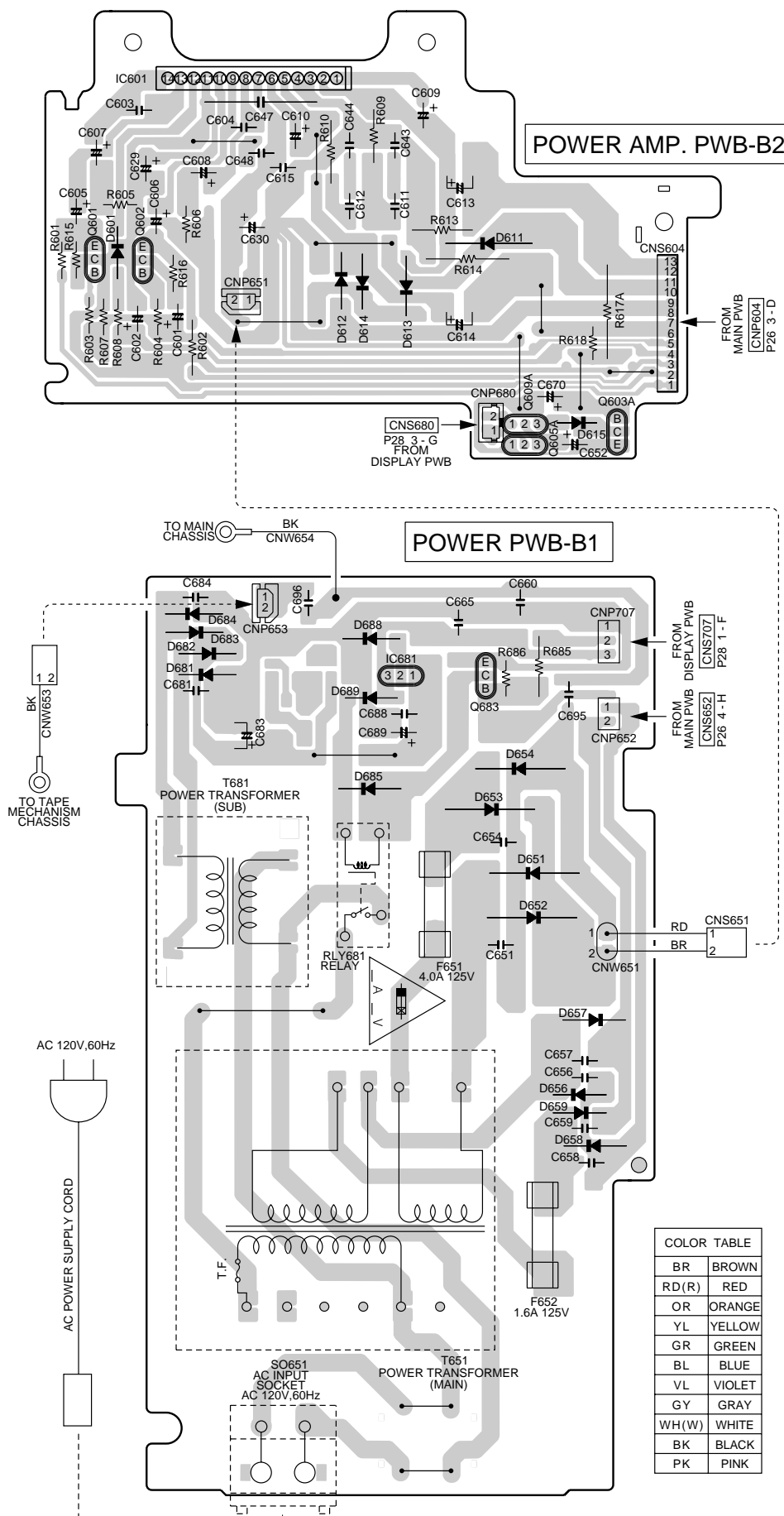
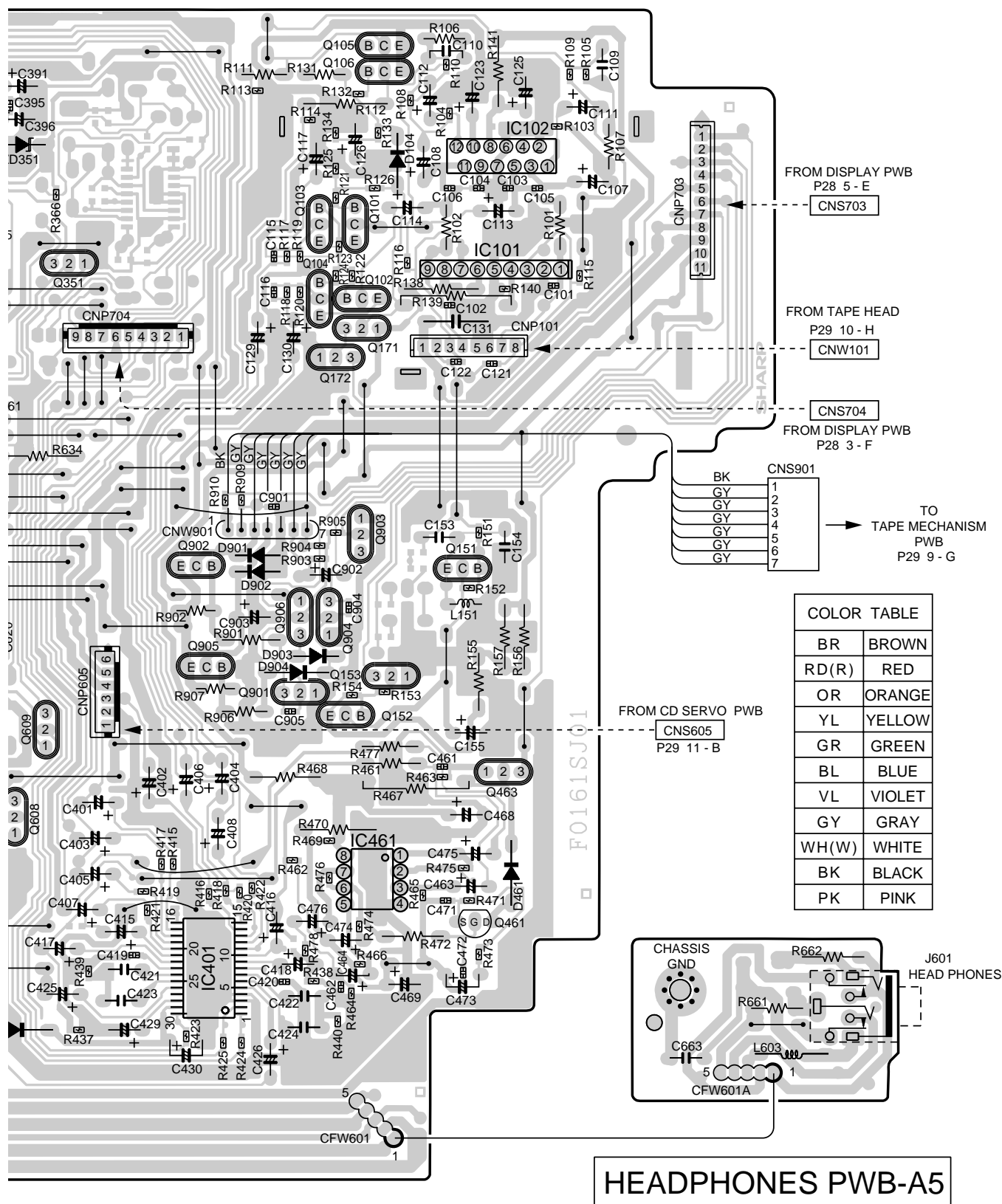


Figure 25 WIRING SIDE OF P.W.BOARD (1/5)

- 26 -

MAIN PWB-A1



7	8	9	10	11	12
---	---	---	----	----	----

Figure 27 WIRING SIDE OF P.W.BOARD (3/5)

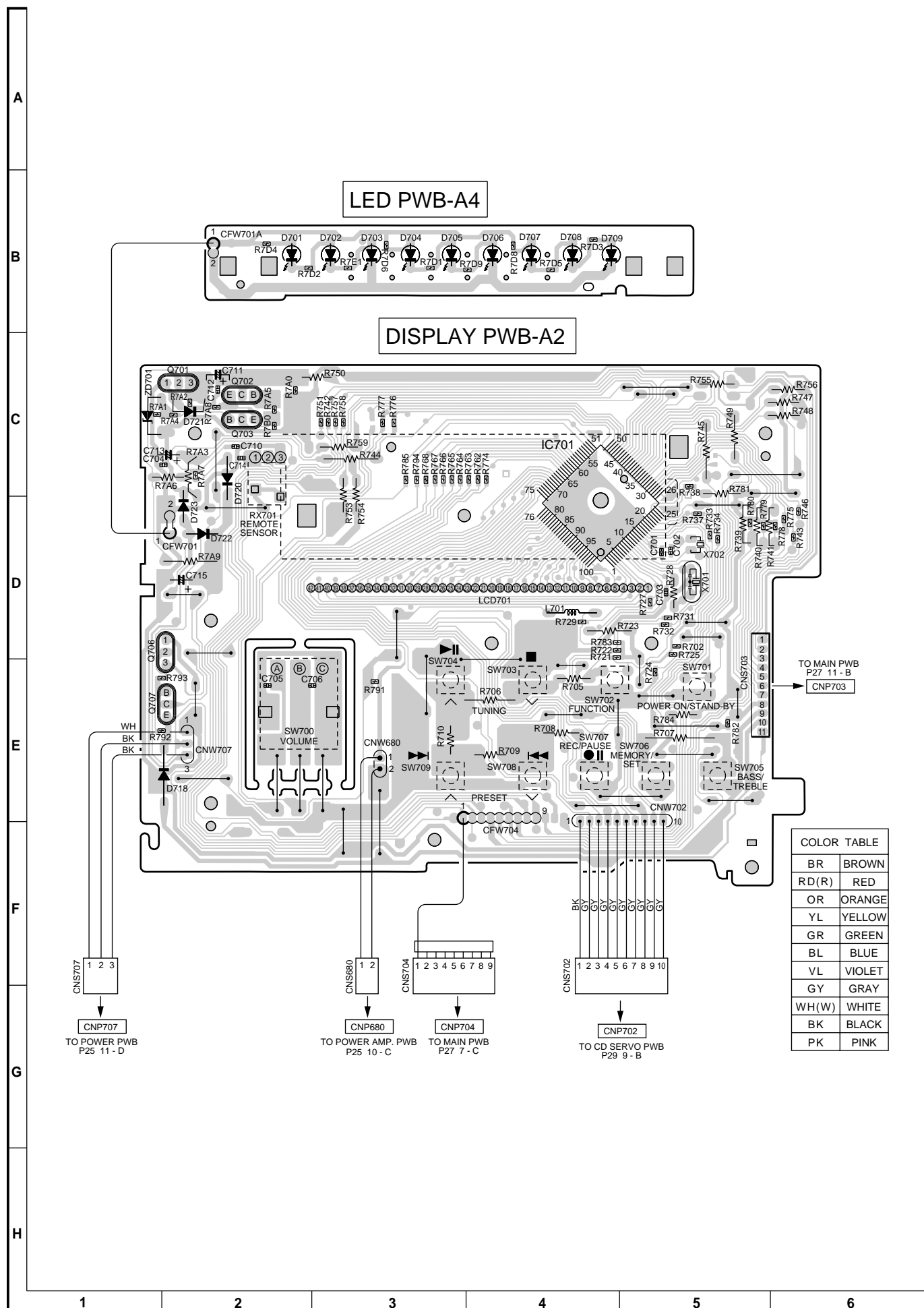
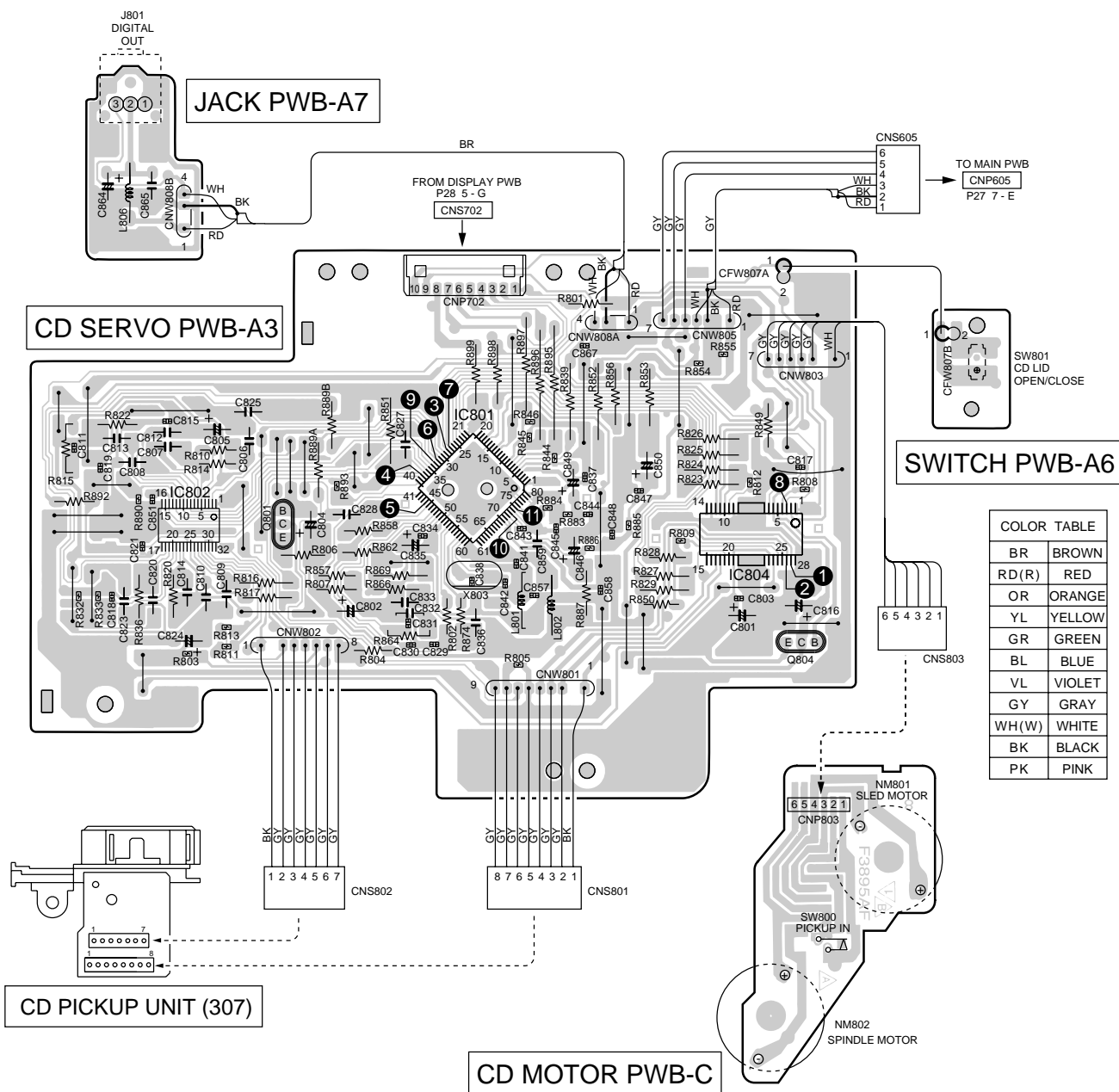


Figure 28 WIRING SIDE OF P.W.BOARD (4/5)

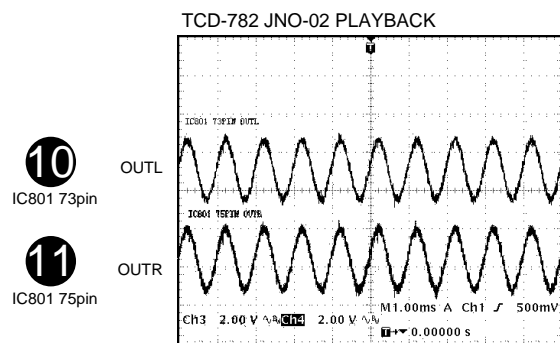
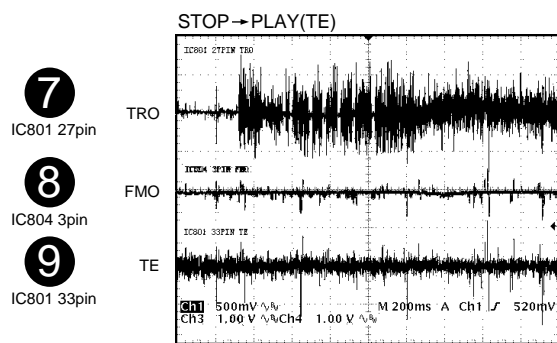
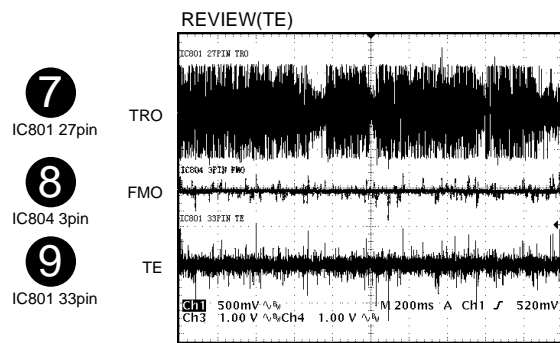
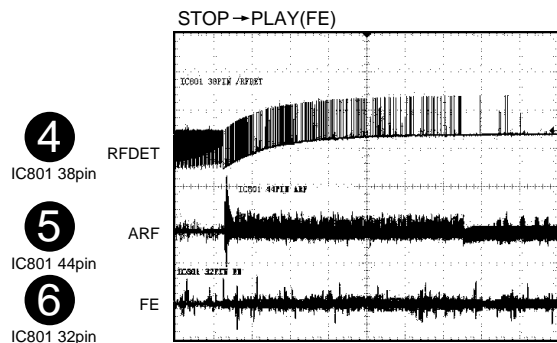
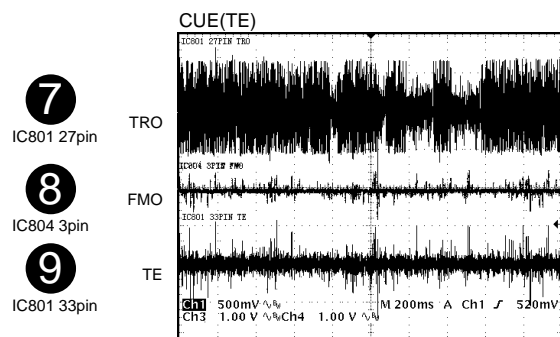
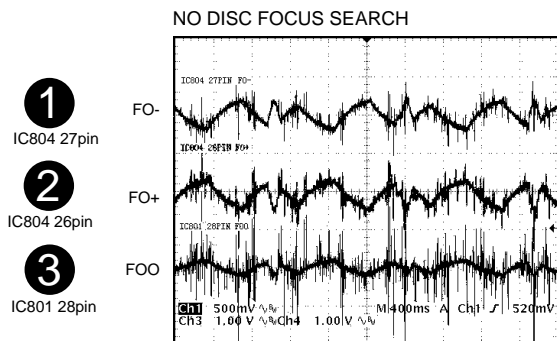


• The numbers ① to ⑪ are waveform numbers shown in page 30.

7	8	9	10	11	12
---	---	---	----	----	----

Figure 29 WIRING SIDE OF P.W.BOARD (5/5)

WAVEFORMS OF CD CIRCUIT



TROUBLESHOOTING

When the CD does not function

When the CD section does not operate when the objective lens of the optical pickup is dirty, this section may not operate. Clean the objective lens, and check the playback operation. When this section does not operate even after the above step is taken, check the following items.

Remove the cabinet and follow the troubleshooting instructions.

"Track skipping and/or no TOC (Table Of Contents) may be caused by build up of dust other foreign matter on the laser pickup lens. Before attempting any adjustment make certain that the lens is clean. If not, clean it as mentioned below."

Turn the power off.

Gently clean the lens with a lens cleaning tissue and a small amount of isopropyl alcohol.

Do not touch the lens with the bare hand.

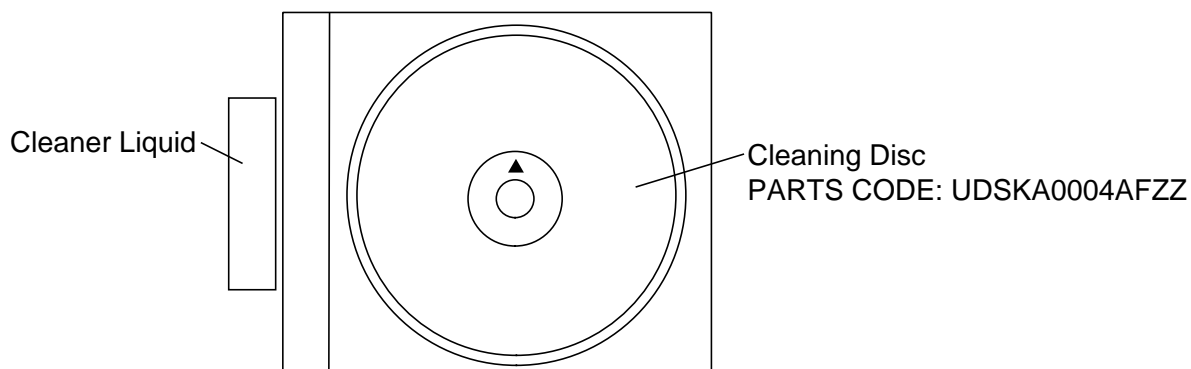
Dust gradually accumulates on the objective lens during use, and it may degrade performance. To avoid this problem, use a cleaning disc designed for CD optical pickup lenses.

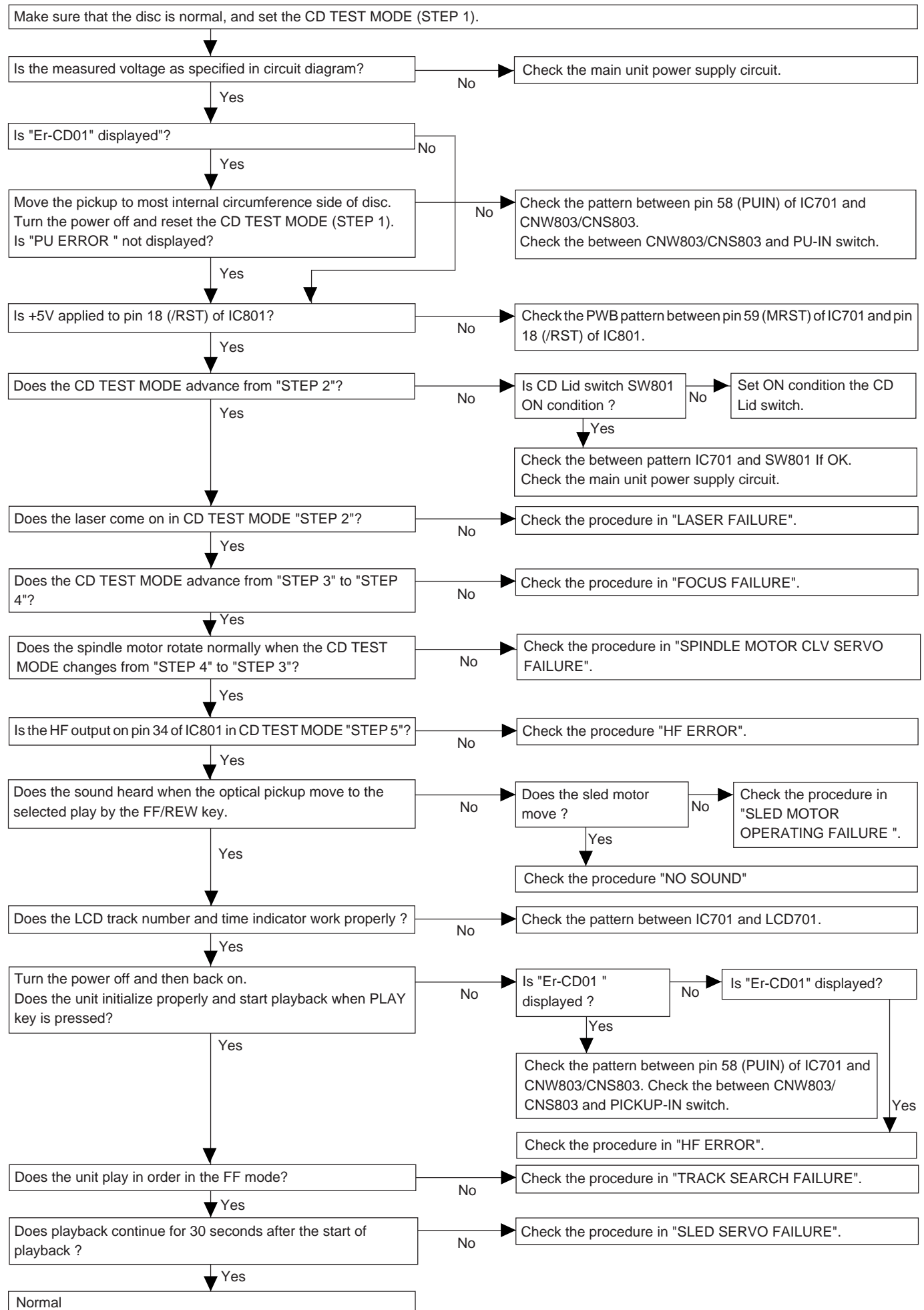
HOW TO USE

1. Using the brush in the cleaner cap, apply 1 or 2 drops of the cleaning fluid to the brush on the CD cleaner disc which has the ▲ mark next to it.
2. Place the CD cleaner disc onto the CD disc tray with the brush side down, then press the play button.
3. You will hear music for about 20 seconds and the CD player will automatically stop. If it continues to turn, press the stop button.

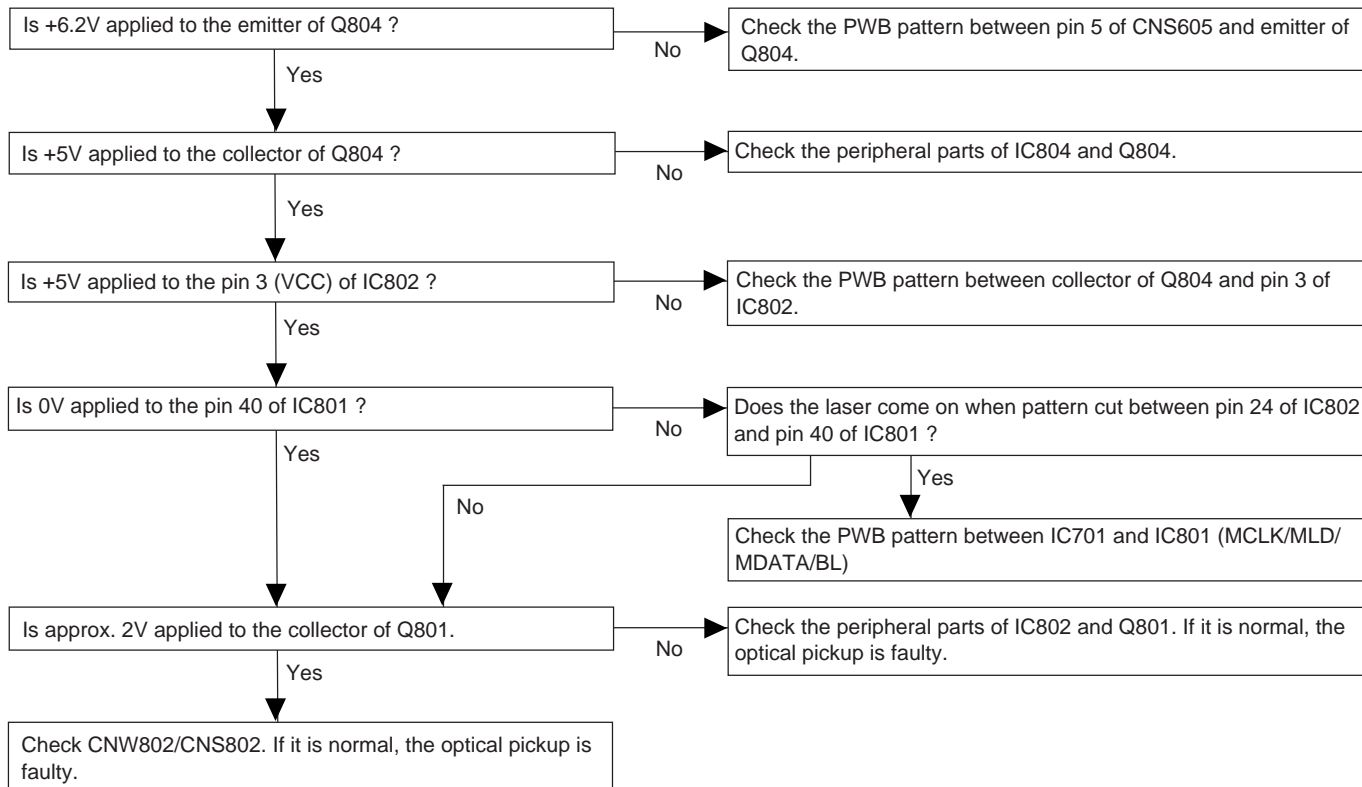
CAUTION

- The CD lens cleaner should be effective for 30~50 operations, however if the brushes become worn out earlier then please replace the cleaner disc.
- If the CD cleaner brushes become very wet then wipe off any excess fluid with a soft cloth.
- Do not drink the cleaner fluid or allow it to come in contact with the eyes. In the event of this happening then drink and / or rinse with clean water and seek medical advice.
- The CD cleaner disc must not be used on car CD players or on computer CD ROM drives.
- All rights reserved. Unauthorized duplicating, broadcasting and renting this product is prohibited by law.

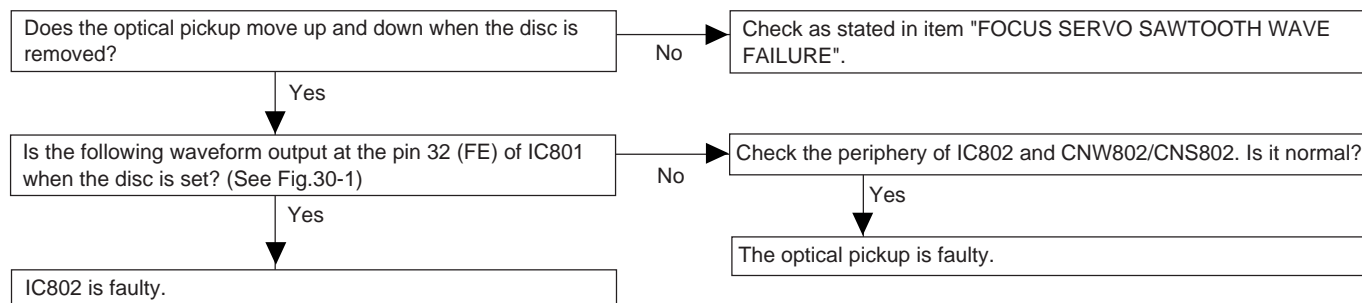




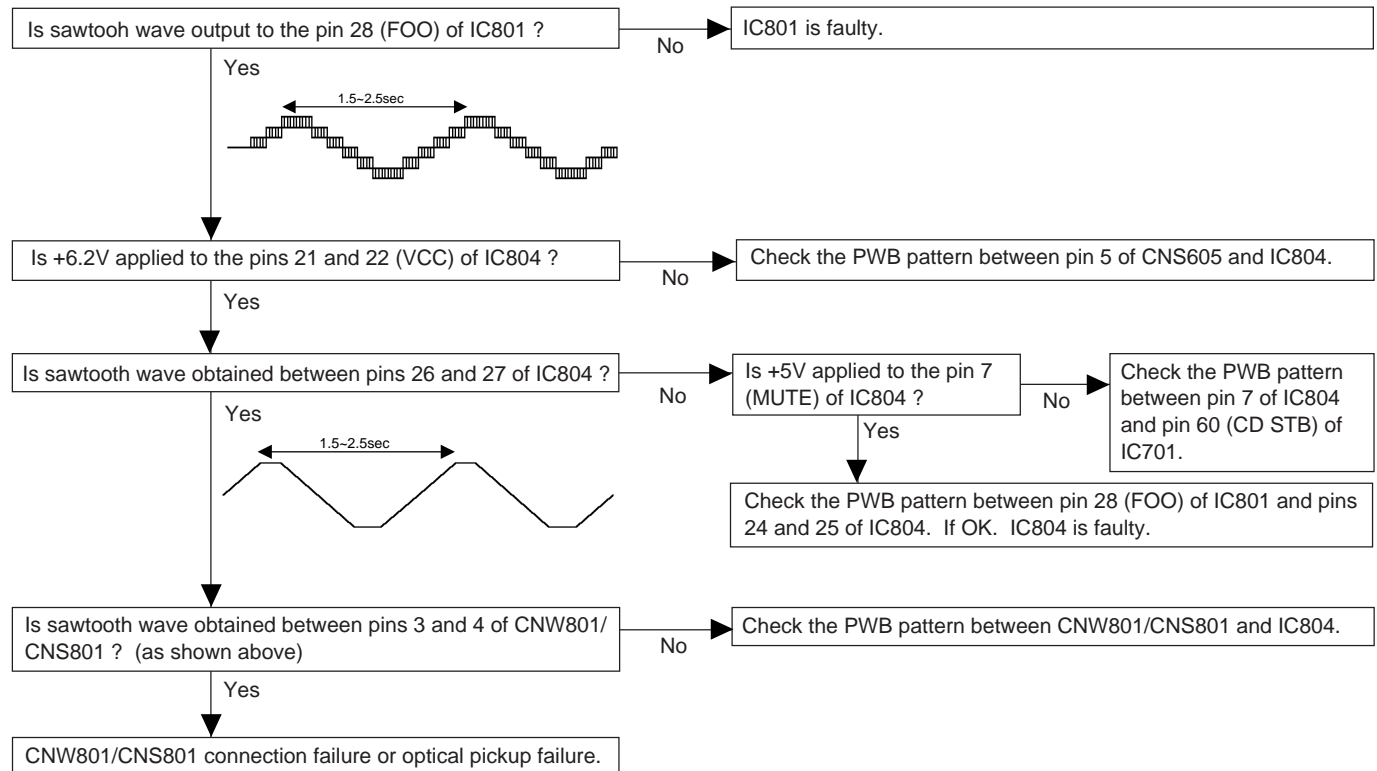
• Laser failure.



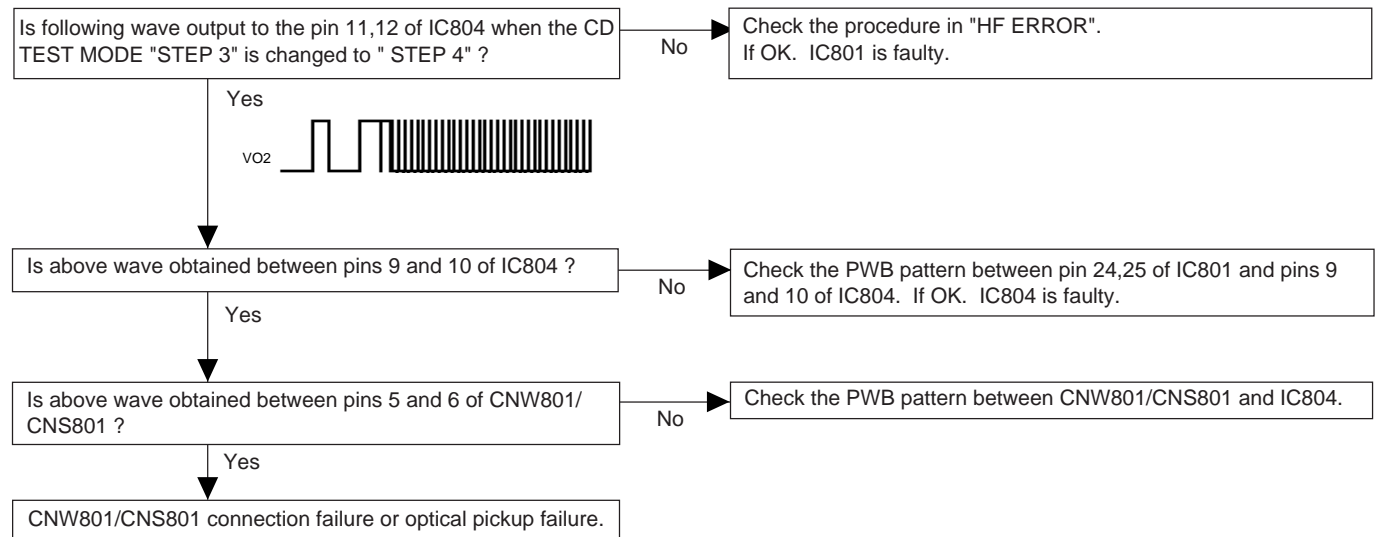
• Focus failure.



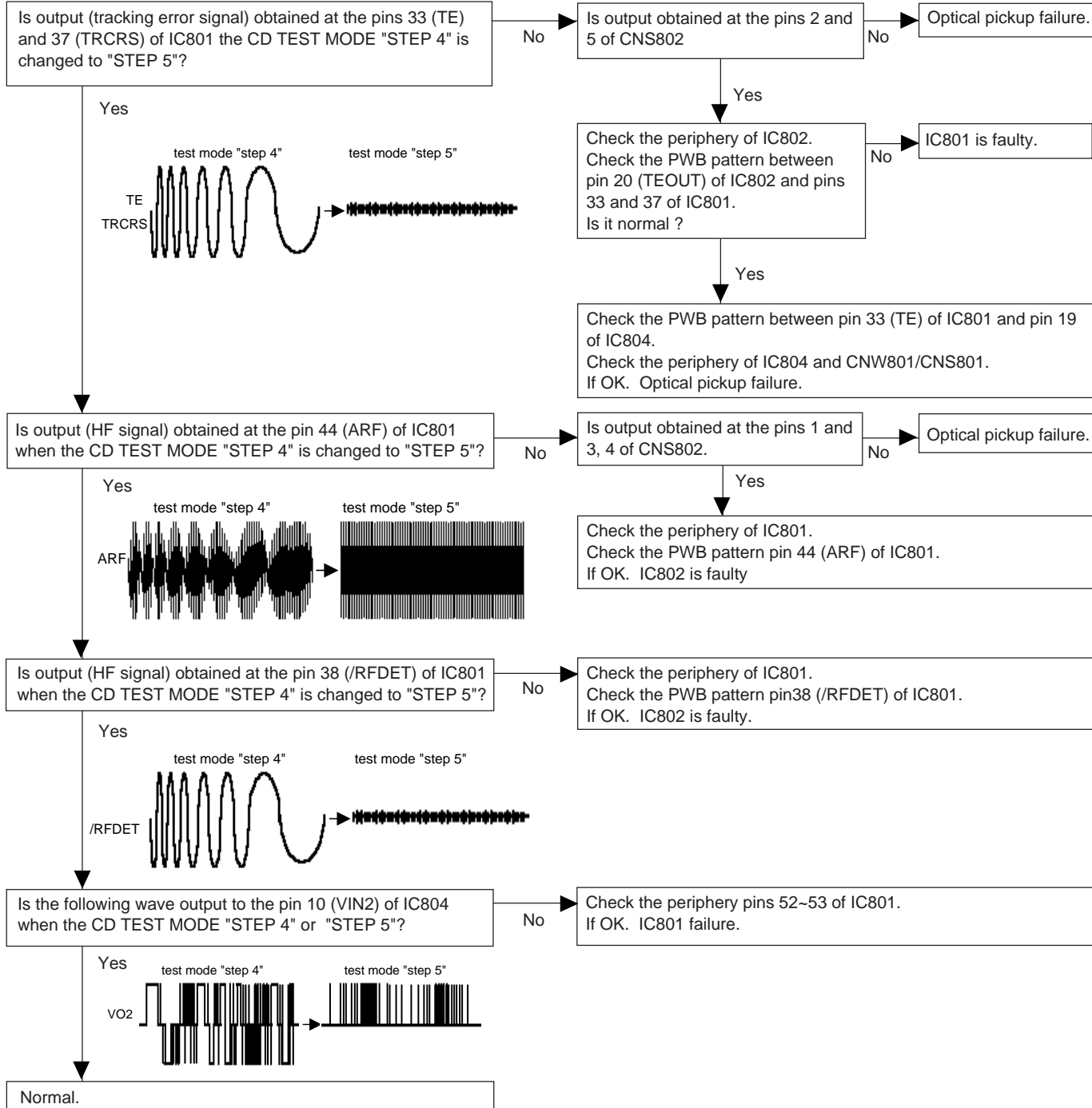
• Focus servo sawtooth wave failure.



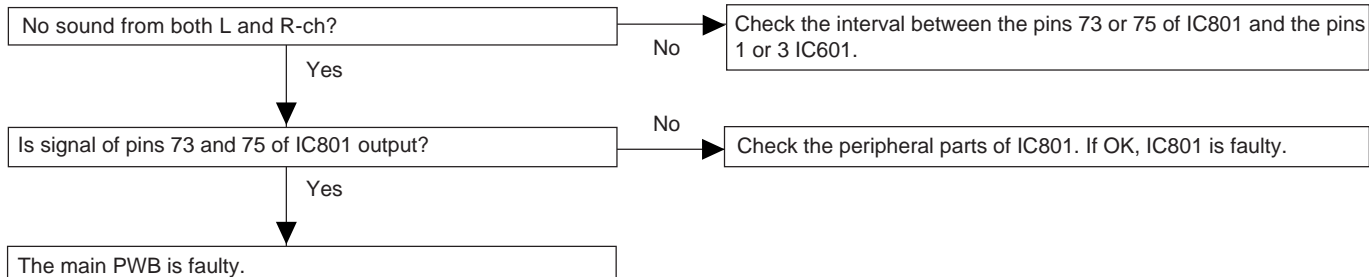
• Spindle motor clv servo failure.



• HF error.



• No sound.



• Track search failure

Does the sled motor run in FF/REW state when the SERVO TEST MODE "STEP1" is set?

No

Check as stated in item "SLED MOTOR OPERATION FAILURE".

Yes

Is the following wave output to the pin 27 (TRO) of IC801 during track search in normal playback?

No

IC801 failure.

Yes



Is the following wave output to the pins 20 (TEOUT) of IC802 during track search in normal playback?

No

Check the PWB pattern between pin 27 (TRO) of IC801 and pin 19 of IC804.
Check the PWB pattern between pins 17 and 18 of IC804 and Optical pickup.
If OK. Optical pickup failure.

Yes



Is the above wave output to the pins 33 (TE) of IC801 during track search in normal playback?

No

Check the PWB pattern between pin 20 (TEOUT) of IC802 and pin 33 of IC801. If OK. IC802 failure.

Yes

Is the following wave output to the pin 38 (/RFDET) of IC801 during track search in normal playback?

No

Check the PWB pattern pin 38 (/RFDET) of IC801 and pin 8 (ARF) and pin 15 (NRFDET) of IC802. If OK. IC802 failure.

Yes



Normal.

• Sled motor operation failure.

Is following sled feed signal input the pin 3 (VIN1) of IC804 when FF/REW key is pressed after the CD TEST MODE "STEP 1" is set?

No

IC801 is faulty.

Yes

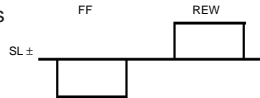


Is following sled feed signal output the pins 1 and 2 of IC804 when FF/REW key is pressed after the CD TEST MODE "STEP 1" is set?

No

IC804 is faulty.

Yes



Is sled feed voltage applied between both terminals of sled motor?

No

Check the CNW803/CNS803.

Yes

Check the CD mechanism (periphery of sled motor).
If the sled motor does not run when DC2.0V is applied to both terminals of sled motor, the sled motor is faulty.

• Sled servo failure.

Is following sled signal output the pin 3 (VIN1) of IC804 during playback?

No

IC801 is faulty.

Yes



Normal.

FUNCTION TABLE OF IC

IC401 VHiLC75342M-1: Function/Volume Equalizer (LC75342M)

Pin No.	Port Name	Function
1	DI	Serial data and clock input pin for control.
2	CE	Chip enable pin. Data written into an internal latch in a timing of [H] -> [L]. Each analog switch is activated. Data transfer enabled at [H] level.
3	VSS	Ground pin.
4	TEST	Electronic volume control pin. To be set to the VSS potential.
5	LOUT	Volume + equalizer output pin.
6	LBASS2	Bass-band filter comprising capacitor and resistor connection pin.
7	LBASS1	Bass-band filter comprising capacitor and resistor connection pin.
8	LTRE	Capacitor connection pin comprising treble band filter.
9	LIN	Volume + equalizer input pin.
10	LSEL0	Input selector output pin.
11	L4	Input signal pin.
12-14	L3-L1	Input signal pin.
15*	NC	No CONNECT pin. To be open or connected to VSS.
16*	NC	No CONNECT pin. To be open or connected to VSS.
17-19	R1-R3	Input signal pin.
20	R4	Input signal pin.
21	RSEL0	Input selector output pin.
22	RIN	Volume + equalizer input pin.
23	RTRE	Capacitor connection pin comprising treble band filter.
24	RBASS1	Bass-band filter comprising capacitor and resistor connection pin.
25	RBASS2	Bass-band filter comprising capacitor and resistor connection pin.
26	ROUT	Volume + equalizer output pin.
27*	NC	No CONNECT pin. To be open or connected to VSS.
28	Vref	0.5 x VDD voltage generation block for analog ground. Capacitor of several 10 μ F to be connected between Vref and AWSS (VSS) as a counter measure against power ripple.
29	VDD	Supply pin.
30	CL	Serial data and clock input pin for control.

In this unit, the terminal with asterisk mark (*) is (open) terminal which is not connected to the outside.

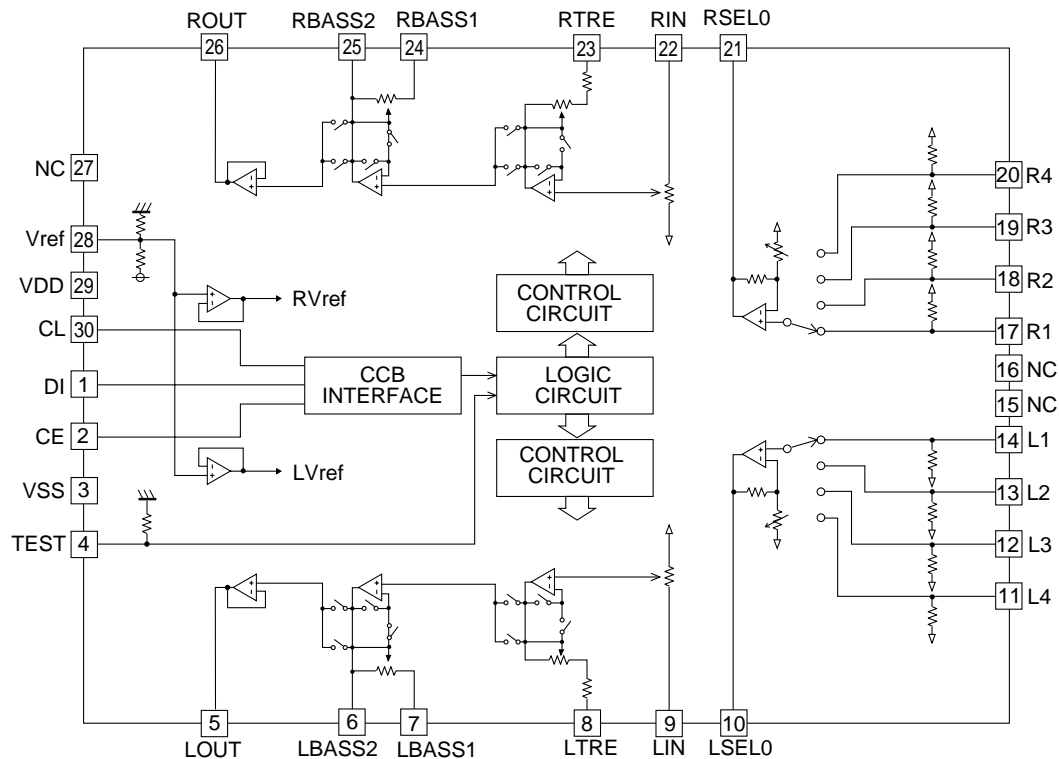


Figure 37 BLOCK DIAGRAM OF IC

IC701 RH-iX0060SJZZ: System Control Microcomputer (IX0060SJ) (1/2)

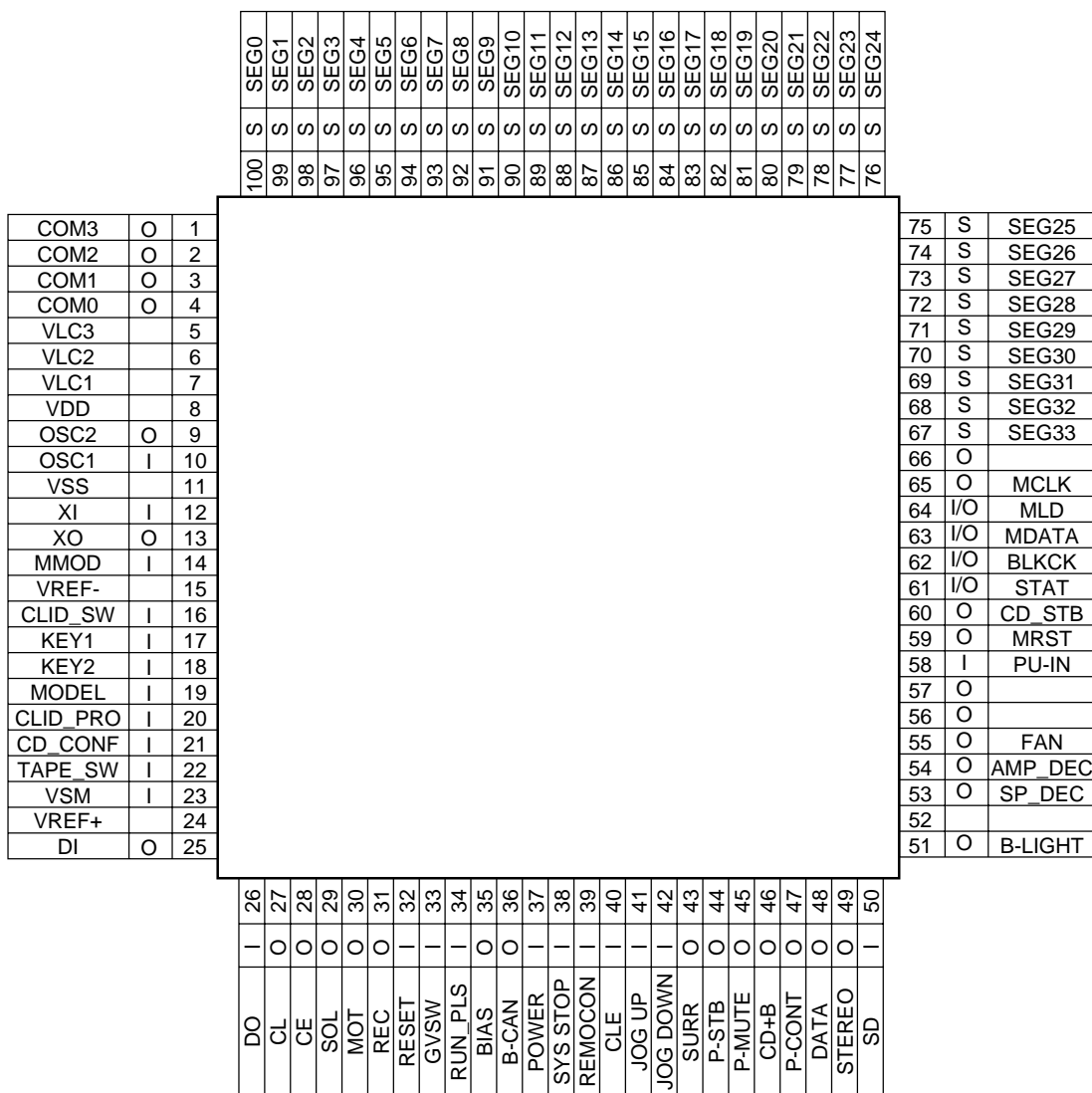
Pin No.	Terminal Name	Input/Output	Function
1-4	COM3-COM0	Output	LCD common output terminal.
5-7	VLC3-VLC1	—	LCD power supply terminal.
8	VDD	—	Microcomputer power supply +5V.
9	OSC2	Output	Oscillator ground terminal for main clock. f=8MHz
10	OSC1	Input	Oscillator ground terminal for main clock. f=8MHz
11	VSS	—	Microcomputer power supply GND.
12	XI	Input	Oscillator ground terminal for sub clock. f=32.768kHz
13	XO	Output	Oscillator ground terminal for sub clock. f=32.768kHz
14	MMOD	Input	Memory mode selection terminal.
15	VREF-	—	Power supply GND for AD converter.
16	KEY0 AN0/PA0	Input	CD lid status detection input.
17	KEY1 AN0/PA1	Input	Operation button input, Max-8 buttons.
18	KEY2 AN0/PA2	Input	Operation button input, Max-8 buttons.
19	KEY3 AN0/PA3	Input	MODEL/TUNER destination input.
20*	KEY4 AN0/PA4	Input	Current detection of CD lid control motor. Used to decide the CD lid drive error to control it.
21	KEY5 AN0/PA5	Input	CD servo auto adjustment mode selection input.
22	KEY6 AN0/PA6	Input	Tape mechanism operating status detection input. Decides the F.P/CAM-SW status with A/D value.
23*	KEY7 AN7/PA7	Input	Tuner signal meter (S meter) voltage input terminal.
24	VREF+	—	Power supply for A/D converter +5V.
25	TXD SBO0/P00	Output	Data output terminal to TUNER PLL IC.
26	RXD SBI0/P01	Input	Data input from TUNER PLL IC
27	SBT0/P02	Output	Synchronous clock output with TUNER PLL IC
28	SBO1/P03	Output	Enable output of TUNER PLL IC. "L" = OFF, "H" = ON
29	SBI1/P04	Output	Tape mechanism solenoid drive control output.
30	SBT1/P05	Output	Tape mechanism motor drive control output.
31	DK/BZER P06	Output	Recording/playback selection output of tape circuit. "H" = Recording mode, "L" = Playback mode
32	RST/P27	Input	Reset signal input
33	RMOUT P10	Input	GVSW input.
34	P11	Input	Tape run/END detection input. Decided as tape run if pulse is input.
35	TM2IO P12	Output	Recording bias oscillation circuit control output. "H" = Bias oscillation, "L" = oscillation stop.
36	TM3IO P13	Output	Recording bias oscillation frequency selection control output.
37	TM4IO P14	Input	Power (POWER) button input detection.
38	IRQ0 P20	Input	Switches to the HALT mode when changing to . "L" at power failure detection input.
39	SENS IRQ1/P21	Input	Remote control signal input.
40*	IRQ2 P22	Input	Synchronous clock input with RDS IC.
41	IRQ3 P23	Input	Jog dial UP pulse input.
42	IRQ4 P24	Input	Jog dial DOWN pulse input.
43*	P30	Output	SURROUND control output.
44	P31	Output	POWER IC STAND-BY terminal CONTROL.
45	P32	Output	Power mute output. "H" = MUTE ON, "L" = MUTE OFF
46	LED0 WE/P50	Output	CD servo power supply circuit control output. "H" = CD power ON, "L" = CD power OFF
47	LED1 RE/P51	Output	Main TRANS RELAY CONTROL. "H" = ON, "L" = OFF
48*	LED2 CS/P52	Input	Data input from RDS IC.
49	LDE3/S51 A16/P53	Input	Radio stereo broadcast reception detection input. "L" = During stereo broadcast reception
50	LED4/S50 A17/P54	Input	Broadcast reception status detection input. "L" = During broadcasting signal reception
51	SEG49 P60/A0	Output	LCD backlight control signal output. "H" = Backlight ON, "L" = Backlight OFF
52*	SEG48 P61/A1	Output	Speaker relay control.
53	SEG47 P62/A2	Output	Speaker output detect.

In this unit, the terminal with asterisk mark (*) is (open) terminal which is not connected to the outside.

IC701 RH-iX0060SJZZ: System Control Microcomputer (IX0060SJ) (2/2)

Pin No.	Terminal Name	Input/Output	Function
54*	SEG46 P63/A3	Output	Power IC amplifier detect.
55*	SEG45 P64/A4	Output	Fan control.
56*	SEG44 P65/A5	Output	
57*	SEG43 P66/A6	Output	
58	SEG42 P67/A7	Input	CD pickup position detection SW input. "L" = Innerst periphery
59	SEG41 P70/A8	Output	Reset signal output for MN8827482W
60	SEG40 P71/A9	Output	ON/OFF output terminal of CD servo control IC. "H" = Servo ON, "L" = Servo stand-by
61-64	SEG39 P72/A10- SEG36 P75/A13	Input/Output	Data input/output terminal for MN8827482W control.
65	SEG35 P76/A14	Output	Data synchronous clock output for MN8827482W.
66*	SEG34 P77/A15	Output	Chip enable terminal for MN8827482W. "L" = BUS terminal active
67	SEG33 P87/D7	—	LCD segment output.
68	SEG32 P86/D6	—	LCD segment output.
69-73, 74	SEG31 P85/D5- SEG26 P80/D0	—	LCD segment output
75-93,100	SEG25-SEG0	—	LCD segment output

In this unit, the terminal with asterisk mark (*) is (open) terminal which is not connected to the outside.

**Figure 39 BLOCK DIAGRAM OF IC**

IC801 VHiMN6627482W: Servo/Signal Control (MN6627482W) (1/2)

Pin No.	Terminal Name	Input/Output	Function
1*	BCLK	Output	SRDATA bit clock output.
2*	LRCK	Output	L/R identification signal output.
3*	SRDATA	Output	Serial data output.
4	DVDD1	Input	Digital circuit power supply.
5	DVSS1	Input	Digital circuit GND.
6*	TX	Output	Digital audio interface output signal.
7	MCLK	Input	Microcomputer command clock signal input. (Data latch at the rising edge.)
8	MDATA	Input	Microcomputer command data input.
9	MLD	Input	Microcomputer command load signal input. L: Load
10*	SENSE	Output	Sense signal output. (OFT, FESL, NACEND, NAJEND, SFG)
11*	/FLOCK	Output	Focus servo lead-in signal. (L: Lead-in)
12*	/TLOCK	Output	Tracking servo lead-in signal. (L: Lead-in)
13	BLKCK	Output	Subcode block clock signal. (fBLKCK=75 Hz)
14	SQCK, GIO0	Input	Default: external clock input for subcode Q resistor. Command execution: general purpose I/O port. CD-TEXT mode 2: TEXT data read clock input.
15*	SUBQ	Output	Subcode Q data output. CD-TEXT mode 2: TEEXT data output.
16	DMUTE	Input	Muting input. (Effective only at bit rate 64fs output.) H: Mute
17	STAT	Output	Status signal. (CRC, STCNT, CLVS, TTSTOP, JCLVS, SQOK, FLAG6, SENE, FLOCK, TLOCK, revolving speed data, FCLV, SUBQ, SYFLG) CD-TEXT mode 3: subcode Q and TEXT data output.
18	/RST	Input	Reset input (L: Reset)
19*	SMCK	Output	MSEL=H: 8.4672 MHz clock signal output. MSEL=L: 4.2336 MHz clock signal output.
20*	PMCK, PLAY	Output	Default: 88.2 kHz clock signal output. Command execution: Play signal output. H: play
21	TRV	Output	Traverse forcing transmission output. 3-State
22	TVD	Output	Traverse drive output.
23*	PC	Output	Spindle motor ON output. L: ON (Default)
24	ECM	Output	Spindle motor drive signal. (Forcing mode output.) 3-State
25	ECS	Output	Spindle motor drive signal. (Servo error signal output.)
26	KICK	Output	Kick pulse output. 3-State
27	TRD	Output	Tracking drive output.
28	FOD	Output	Focus drive output.
29	VREF	Input	DA output section (TVD, ECS, TRD, FOD, FBAL, TBAL, TOFS) reference voltage.
30	FBAL	Output	Focus balance adjustment output.
31	TBAL	Output	Tracking balance adjustment output.
32	FE	Input	Focus error signal input. (Analog input)
33	TE	Input	Tracking error signal input. (Analog input)
34	RFENV	Input	RF envelope signal input. (Analog input)
35	VDET	Input	Oscillation detection signal input. H: Detection
36	OFT	Input	Off track signal input. H: Off track
37	TRCRS	Input	Track cross signal input. (Analog input)
38	/RFDET	Input	RF detection signal input. L: Detection
39	BDO	Input	Drop out signal input. H: Drop out
40	LDON	Output	Laser ON signal output. H: ON
41	PLL2	Input/Output	Loop filter characteristic switch terminal for PLL.
42*	TOFS	Output	Tracking offset adjustment output. (Shared with general purpose DA output terminal.)
43*	WVEL	Output	Double-speed status signal output. H: Double-speed
44	ARF	Input	RF signal input.
45	IREF	Input	Reference current input terminal
46*	DRF	Input	DSL bias terminal.

In this unit, the terminal with asterisk mark (*) is (open) terminal which is not connected to the outside.

IC801 VHiMN6627482W: Servo/Signal Control (MN6627482W) (2/2)

Pin No.	Terminal Name	Input/Output	Function
47	DSL F	Input/Output	DSL loop filter terminal.
48	PLL F	Input/Output	PLL loop filter terminal.
49	VCO F	Input/Output	VCO loop filter terminal.
50	AVDD2	Input	Analog circuit power supply. (DSL, PLL and DA output sections for AD)
51	AVSS2	Input	Analog circuit GND. (DSL, PLL and DA output sections for AD)
52*	EFM, CK384	Output	· IOSEL=H: EFM signal output. · IOSEL=L: X-tal system 16.9344 MHz clock output. Signal processing system: 384fs output. (VCO clock for jitter-free operation) (X-tal system or signal processing system can be selected by the command.)
53	PCK, DSLB	Output	PLL extraction clock output or DSL balance output. fPCK=4.3218 MHz
54	VCO F2	Input/Output	Loop filter terminal for digital servo 33.8688 MHz creation VCO. X-tal 16.9344 MHz: external circuit is needed.
55*	SUBC	Output	Subcode serial output. CD-TEXT mode 1: TEXT data output.
56*	SBCK	Input	Subcode serial output clock input. CD-TEXT mode 1: TEXT data read clock input
57	VSS	Input	Oscillation circuit GND.
58	X1	Input	Oscillation circuit input terminal. f=16.9344 MHz, 33.8688 MHz
59	X2	Output	Oscillation circuit output terminal. f=16.9344 MHz, 33.8688 MHz
60	VDD	Input	Oscillation circuit power supply.
61*	BYTCK, TRVSTP	Output	IOSEL=H: byte clock signal output. IOSEL=L: traverse STOP signal output. H: STOP Mode
62*	GIO1, /CLDCK	Output	Default: general purpose I/O port. Command execution: terminal for subcode frame clock signal output. (fCLDCK=7.35 kHz)
63*	GIO2, FCLK	Output	Default: general purpose I/O port. Command execution: crystal frame clock signal output. (fFCLK=7.35 kHz)
64*	IPFLAG	Output	Interpolation flag signal output. H: Interpolation
65*	FLAG	Output	Flag signal output.
66*	CLVS	Output	Output for spindle servo phase synchronization signal. H: CLV, L: Rough servo
67*	CRC	Output	Default: output for subcode CRC check results. H: OK, L: NG
68*	DEMPH	Output	Demphasis detection signal output. H: ON
69*	RESY, FLAG6	Output	IOSEL= H: resync signal RESY output for frame synchronization. H: Synchronization, L: Synchronization lost IOSEL=L: RAM address reset signal for error correct deinterleave. FLAG 6 output L: Address reset
70	IOSEL	Input	Mode switch terminal.
71	/TEST	Input	Test terminal. Normal: H
72	AVDD1	Input	Analog circuit power supply. (Audio output section (for both Lch and Rch))
73	OUTL	Output	Lch audio output.
74	AVSS1	Input	Analog circuit GND. (Audio output section (for both Lch and Rch))
75	OUTR	Output	Rch audio output.
76	RSEL, GIO3	Input	Default: RF signal polarity specification terminal. Brightness H: RESEL=H Brightness L: RESEL=L Command execution: general purpose I/O port. RF signal polarity can be specified by command. CD-TEXT mode 1 or 2: TEXT data read enabling signal (DQSY) output
77	CSEL	Input	Oscillation frequency specification terminal. H: Oscillation frequency=33.8688 MHz L: Oscillation frequency=16.9344 MHz
78	PSEL	Input	IOSEL=H: test terminal. (Normal: L) IOSEL=L: SRDATA input.
79	MSEL	Input	IOEL=H: SMCK terminal output, frequency switch terminal. H: SMCK=8.4672 MHz L: SMCK=4.2336 MHz IOSEL=L: LRCK input H: Lch data, L: Rch data SMCK=4.2336 MHz fixed
80	SSEL	Input	IOSEL=H: switch terminal for SUBQ terminal output mode. H: Q code buffer mode L: CLDCK synchronization mode IOSEL=L: BCLK input Q code buffer mode fixed

In this unit, the terminal with asterisk mark (*) is (open) terminal which is not connected to the outside.

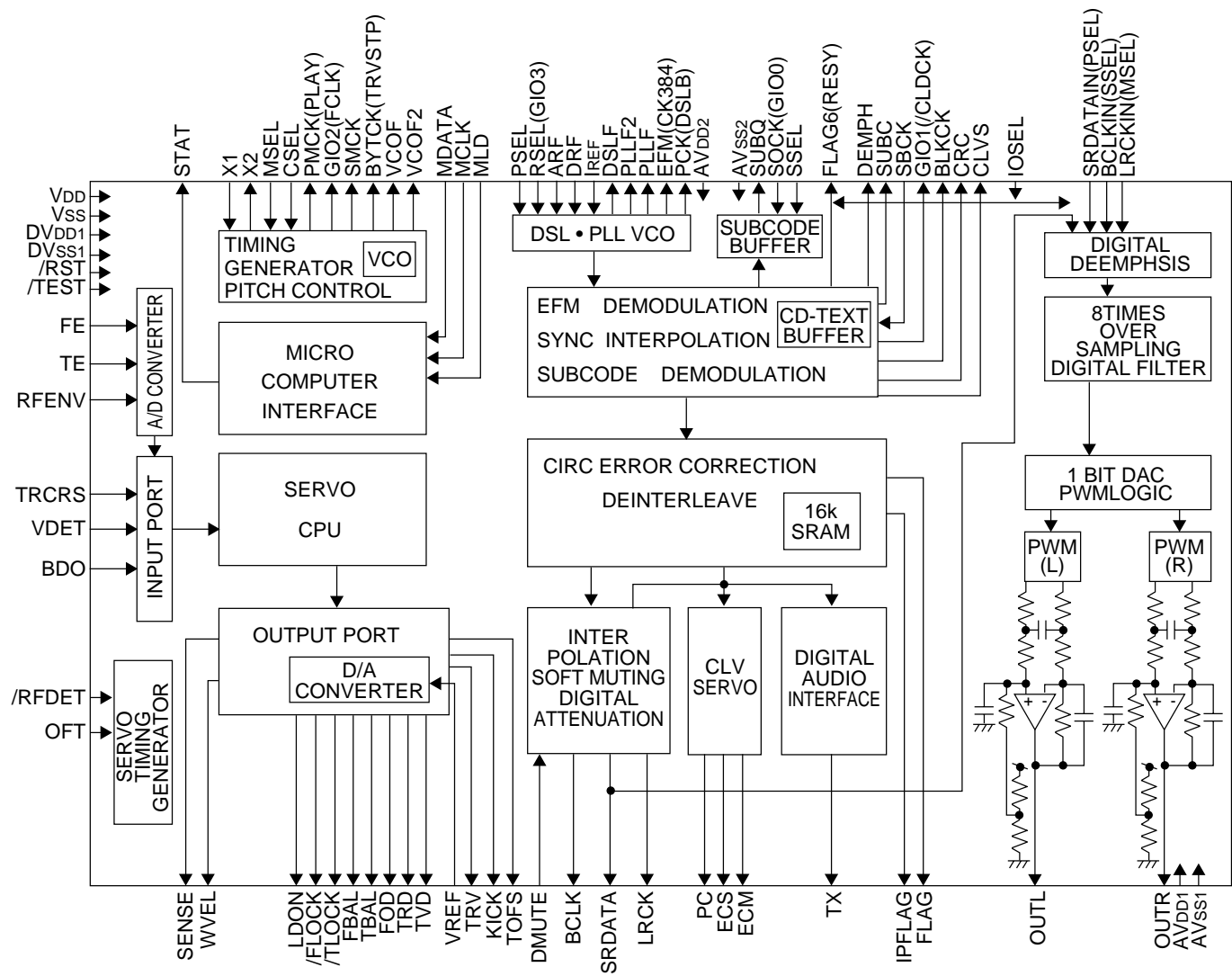
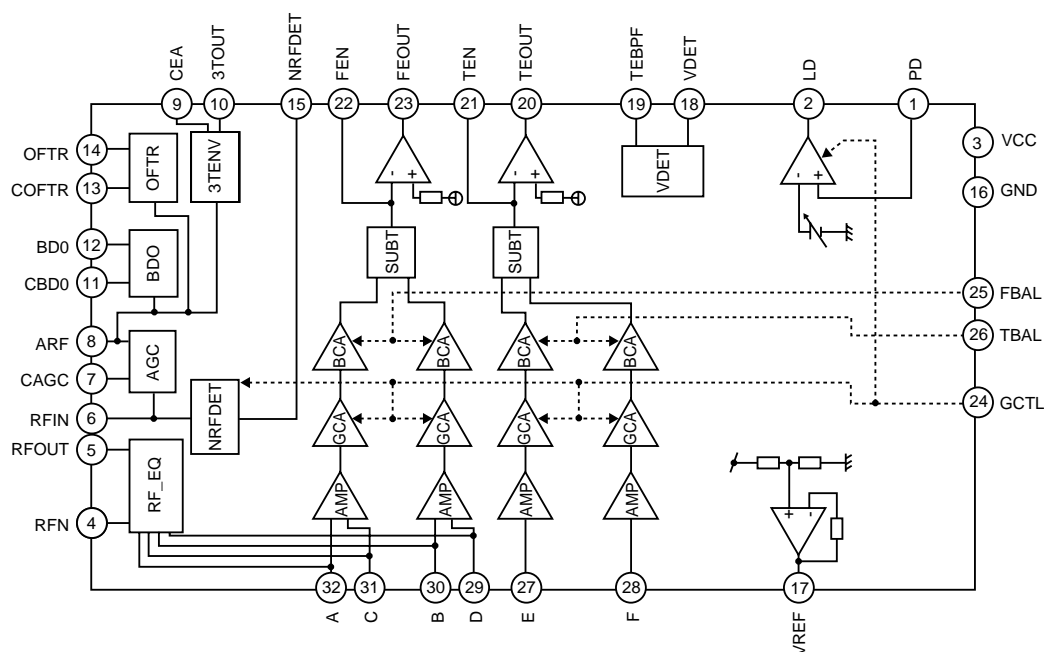


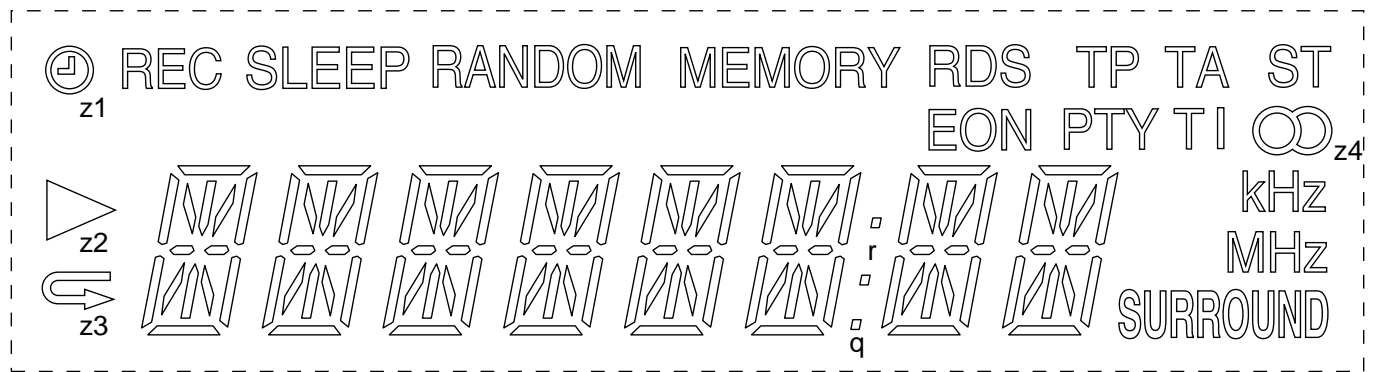
Figure 42 BLOCK DIAGRAM OF IC

IC802 VHiAN22000A-1: Head Amp. (AN22000A)

Pin No.	Terminal Name	Function
1	PD	APC amp input.
2	LD	APC amp output.
3	VCC	Power supply.
4	RFN	RF amp inverting input.
5	RFOUT	RF addition amp output.
6	RFIN	AGC amp input.
7	CAGC	AGC loop filter connection.
8	ARF	AGC output.
9	CEA	Capacitor for HPF-amp connection.
10	3TOUT	3T-ENV output.
11	CBDO	Capacitor for RF dark-side envelope detection connection.
12	BDO	BDO output.
13	COFTR	Capacitor for RF bright-side envelope detection connection.
14	OFTR	OFTR output.
15	NRFDET	NRFDET output.
16	GND	Ground
17	VREF	VREF output.
18	VDET	VDET output.
19	TEBPF	VDET input.
20	TEOUT	TE amp output.
21	TEN	TE amp inverting input.
22	FEN	FE amp inverting input.
23	FEOUT	FE amp output.
24	GCTL	Gain & APC control.
25	FBAL	FBAL control.
26	TBAL	TBAL control.
27	E	Tracking signal input 1.
28	F	Tracking signal input 2.
29	D	Focus signal input 4.
30	B	Focus signal input 2.
31	C	Focus signal input 3.
32	A	Focus signal input 1.

**Figure 43 BLOCK DIAGRAM OF IC**

LCD701: RV-LX0007SJZZ LCD Display



1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42

PinNo	com1	com2	com3	com4
1	com1			
2		com2		
3			com3	
4				com4
5	z1	b1	c1	z2
6	h1	j1	l1	k1
7	g1	n1	m1	d1
8	a1	p1	f1	e1
9	REC	b2	c2	z3
10	h2	j2	l2	k2
11	g2	n2	m2	d2
12	a2	p2	f2	e2
13	SLEEP	b3	c3	MHz
14	h3	j3	l3	k3
15	g3	n3	m3	d3
16	a3	p3	f3	e3
17	RANDOM	b4	c4	kHz
18	h4	j4	l4	k4
19	g4	n4	m4	d4
20	a4	p4	f4	e4
21	MEMORY	b5	c5	z4

PinNo	com1	com2	com3	com4
22	h5	j5	l5	k5
23	g5	n5	m5	d5
24	a5	p5	f5	e5
25	RDS	b6	c6	ST
26	h6	j6	l6	k6
27	g6	n6	m6	d6
28	a6	p6	f6	e6
29	r	b7	c7	q
30	h7	j7	l7	k7
31	g7	n7	m7	d7
32	a7	p7	f7	e7
33	TP	b8	c8	
34	h8	j8	l8	k8
35	g8	n8	m8	d8
36	a8	p8	f8	e8
37	EON	PTY	TI	TA
38				SRS(0)
39				com4
40			com3	
41		com2		
42	com1			

Figure 44 LCD SEGMENT

SHARP PARTS GUIDE

MICRO COMPONENT SYSTEM

MODEL XL-55

XL- 55 Micro Component System consisting of XL- 55 (main unit) and CP- XL55 (speaker system).

MODEL XL-55C

XL- 55C Micro Component System consisting of XL- 55C (main unit) and CP- XL55 (speaker system).

"HOW TO ORDER REPLACEMENT PARTS"

To have your order filled promptly and correctly, please furnish the following information.

- | | |
|-----------------|----------------|
| 1. MODEL NUMBER | 2. REF. No. |
| 3. PART NO. | 4. DESCRIPTION |

★ MARK: SPARE PARTS-DELIVERY SECTION

For U.S.A. only

Contact your nearest SHARP Parts Distributor to order.

For location of SHARP Parts Distributor,
Please call Toll-Free;
1-800-BE-SHARP

Explanation of capacitors/resistors parts codes

Capacitors

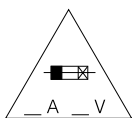
VCC Ceramic type
VCK Ceramic type
VCT Semiconductor type
VC •• MF Cylindrical type (without lead wire)
VC •• MN Cylindrical type (without lead wire)
VC •• TV Square type (without lead wire)
VC •• TQ Square type (without lead wire)
VC •• CY Square type (without lead wire)
VC •• CZ Square type (without lead wire)
VC J .. The 13th character represents capacity difference.
("J" $\pm 5\%$, "K" $\pm 10\%$, "M" $\pm 20\%$, "N" $\pm 30\%$,
"C" ± 0.25 pF, "D" ± 0.5 pF, "Z" $+80-20\%$.)

If there are no indications for the electrolytic capacitors, error is $\pm 20\%$.

Resistors

VRD Carbon-film type
VRS Carbon-film type
VRN Metal-film type
VR •• MF Cylindrical type (without lead wire)
VR •• MN Cylindrical type (without lead wire)
VR •• TV Square type (without lead wire)
VR •• TQ Square type (without lead wire)
VR •• CY Square type (without lead wire)
VR •• CZ Square type (without lead wire)
VR J .. The 13th character represents error.
("J" $\pm 5\%$, "F" $\pm 1\%$, "D" $\pm 0.5\%$.)

If there are no indications for other parts, the resistors are $\pm 5\%$ carbon-film type.



CAUTION:FOR CONTINUED
PROTECTION AGAINST FIRE
HAZARD, REPLACE ONLY WITH
SAME TYPE F651 4.0A, 125V/
F652 1.6A, 125V FUSES.

ATTENTION:POUR ASSURER
UNE LONGUE PROTECTION CONTRE
UN INCENDIE, REMPLACER SEULEMENT
PAR UN FUSIBLE DE
TYPE F651 4.0A, 125V/
F652 1.6A, 125V FUSES.

NOTE:

Parts marked with "△" are important for maintaining the safety of the set.
Be sure to replace parts with specified ones for maintaining the safety and performance of the set.

XL-55/55C

NO.	PART CODE	★	PRICE RANK	DESCRIPTION
INTEGRATED CIRCUITS				
IC101	VHIBA3126N/-1	J	AF	Head Selector,BA3126N
IC102	VHIBA3311L/-1	J	AK	REC./P.B.Equalizer Amp., BA3311L
IC301	VHITA7358AP-1	J	AG	FM Front End,TA7358AP
IC302	VHILC72131/-1	J	AP	PLL (Tuner),LC72131
IC303	VHILA1832S/-1	J	AN	FM IF Det./FM Mpx./AM IF, LA1832S
IC401	VHILC75342M-1	J	AN	Function/Volume Equalizer, LC75342M
IC461	VHIKIA4558P-1	J	AC	Ope Amp.,KIA4558P
IC601	VHILA4451/-1	J	AN	Power Amp.,LA4451
IC681	VHIAN78L05/-1	J	AE	Voltage Regulator,KIA7805P
IC701	RH-IX0060SJZZ	J	AX	System Control Microcomputer, IX0060SJ
IC801	VHIMN6627482W	J	AV	Servo/Signal Control, MN6627482W
IC802	VHIAN22000A-1	J	AF	Head Amp.,AN22000A
IC804	VHIMM1469XH-1	J	AN	Focus/Tracking/Spin/Sled Driver, MM1469XH

TRANSISTORS

Q101~106	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q151	VS2SC2001-K-1	J	AD	Silicon,NPN,2SC2001 K
Q152	VS2HA1015GR-1	J	AB	Silicon,PNP,2HA1015 GR
Q153	VSKRC104M/-1	J	AC	Digital,NPN,KRC104 M
Q171	VSKRA102M/-1	J	AC	Digital,PNP,KRA102 M
Q172	VSKRC102M/-1	J	AC	Digital,NPN,KRC102 M
Q302	VSSC1674-C/-1	J	AC	Silicon,NPN,SC1674 C
Q306	VSSC1674-C/-1	J	AC	Silicon,NPN,SC1674 C
Q351	VSKRC104M/-1	J	AC	Digital,NPN,KRC104 M
Q360	VS2HA1015GR-1	J	AB	Silicon,PNP,2HA1015 GR
Q461	VS2SK2541/-1	J	AC	FET,2SK2541
Q463	VSKRC107M/-1	J	AC	Digital,NPN,KRC107 M
Q601~603	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q603A	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q604,605	VSKTC2026Y/-1	J	AE	Silicon,NPN,KTC2026 Y
Q605A	VSKRC107M/-1	J	AC	Digital,NPN,KRC107 M
Q606	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q607	VSKTC2026Y/-1	J	AE	Silicon,NPN,KTC2026 Y
Q608	VSKRA102M/-1	J	AC	Digital,PNP,KRA102 M
Q609	VSKRC107M/-1	J	AC	Digital,NPN,KRC107 M
Q609A	VSKRA107M/-1	J	AE	Digital,PNP,KRA107 M
Q683	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q701	VSKRC102M/-1	J	AC	Digital,NPN,KRC102 M
Q702,703	VS2HC1815GR-1	J	AB	Silicon,NPN,2HC1815 GR
Q706	VSKRC102M/-1	J	AC	Digital,NPN,KRC102 M
Q707	VS2HA1015GR-1	J	AB	Silicon,PNP,2HA1015 GR
Q801	VS2HA1015GR-1	J	AB	Silicon,PNP,2HA1015 GR
Q804	VSHSB562-C/-1	J	AC	Silicon,PNP,HSB562 C
Q901	VSKRC102M/-1	J	AC	Digital,NPN,KRC102 M
Q902	VSHSB562-C/-1	J	AC	Silicon,PNP,HSB562 C
Q903	VSKRC107M/-1	J	AC	Digital,NPN,KRC107 M
Q904	VSKRC102M/-1	J	AC	Digital,NPN,KRC102 M
Q905	VSHSB562-C/-1	J	AC	Silicon,PNP,HSB562 C
Q906	VSKRA102M/-1	J	AC	Digital,PNP,KRA102 M

DIODES

D104	VHD1N4148/-1	J	AA	Silicon,1N4148
D301,302	VHD1N4148/-1	J	AA	Silicon,1N4148
D305~308	VHD1N4148/-1	J	AA	Silicon,1N4148
D401~403	VHD1N4004/-1	J	AB	Silicon,1N4004
D461	VHD1N4148/-1	J	AA	Silicon,1N4148
D601~604	VHD1N4148/-1	J	AA	Silicon,1N4148
D611~614	VHD1N4004/-1	J	AB	Silicon,1N4004
D615	VHD1N4148/-1	J	AA	Silicon,1N4148
D651~654	VHD1N5402M/-1	J	AE	Silicon,1N5402M
D656~659	VHD1N4004/-1	J	AB	Silicon,1N4004
D681~685	VHD1N4004/-1	J	AB	Silicon,1N4004
D688,689	VHD1N4004/-1	J	AB	Silicon,1N4004
D701~709	VHPMPG3372X-V	J	AD	LED,Green,MPG3372X
D718	VHD1N4004/-1	J	AB	Silicon,1N4004
D720~723	VHD1N4148/-1	J	AA	Silicon,1N4148
D901~904	VHD1N4148/-1	J	AA	Silicon,1N4148
VD301	VHCSVC348S/-1	J	AK	Variable Capacitance,SVC348S
VD302,303	VHCKDV147B/-1	J	AH	Variable Capacitance,KDV147B
ZD351	VHEDZ5R1BSB-1	J	AC	Zener,5.1V,DZ5.1BSB

NO.	PARTS CODE	★	PRICE RANK	DESCRIPTION
ZD601	VHEDZ130BSA-1	J	AC	Zener,13V,DZ130A
ZD602	VHEDZ7R5BSC-1	J	AB	Zener,7.5V,DZ7.5C
ZD701	VHEDZ3R3BSB-1	J	AB	Zener,3.3V,DZ3.3BSB

FILTERS

BF301	RFILR0008AWZZ	J	AE	Band Pass Filter
CF302,303	RFILF0004SJZZ	J	AG	FM IF,10.7 MHz
CF351	RFILF0003AWZZ	J	AK	FM IF
CF352	RFILA0003SJZZ	J	AF	AM IF

TRANSFORMERS

T302	RCILA0007SJZZ	J	AG	AM Tracking
T304	RCILI0005SJZZ	J	AF	FM IF
T306	RCILB0009SJZZ	J	AG	AM OSC.
T351	RCILI0004SJZZ	J	AF	AM IF
△ T651	RTRNP0110SJZZ	J	AY	Power Transformer (Main)
△ T681	RTRNP0056SJZZ	J	AM	Power Transformer (Sub)

COILS

L151	VP-MK331K0000	J	AB	330 μ H,Choke
L302	RCILR0003SJZZ	J	AD	FM RF
L303	RCILB0016SJZZ	J	AD	FM OSC.
L351,352	VP-DH101K0000	J	AB	100 μ H,Choke
L353	VP-DH102K0000	J	AB	1 mH,Choke
L603	VP-DH100K0000	J	AB	10 μ H,Choke
L701	VP-DH101K0000	J	AB	100 μ H,Choke
L801,802	VP-DHR82K0000	J	AE	0.82 μ H,Choke
L806	VP-XHR82K0000	J	AC	0.82 μ H

VARIABLE RESISTOR

VR351	RVR-M0026AWZZ	J	AC	10 kohm (B),Semi-VR
-------	---------------	---	----	---------------------

VIBRATORS

X351	RCRM-0007SJZZ	J	AG	VCO,456 kHz
X352	RCRSP0006SJZZ	J	AF	Crystal,4.5 MHz
X701	RCRM-0008SJZZ	J	AG	Ceramic,8 MHz
X702	RCRSP0007SJZZ	J	AE	Crystal,32.768 kHz
X803	RCRSP0002SJZZ	J	AL	Crystal,16.93 MHz

CAPACITORS

C101,102	VCKYCY1HB102K	J	AA	0.001 μ F,50V
C103,104	VCKYCY1HB331K	J	AA	330 pF,50V
C105,106	VCKYCY1HB271K	J	AA	270 pF,50V
C107,108	RC-GZA476AF1C	J	AB	47 μ F,16V,Electrolytic
C109,110	VCQYKA1HM153J	J	AB	0.015 μ F,50V,Mylar
C111,112	RC-GZA106AF1C	J	AB	10 μ F,16V,Electrolytic
C113,114	RC-GZA475AF1E	J	AB	4.7 μ F,25V,Electrolytic
C115,116	VCKYCY1HB222K	J	AA	0.0022 μ F,50V
C117	RC-GZA106AF1C	J	AB	10 μ F,16V,Electrolytic
C121,122	VCCSCY1HL820J	J	AA	82 pF,50V
C123	RC-GZA225AF1H	J	AB	2.2 μ F,50V,Electrolytic
C125	RC-GZA107AF1E	J	AB	100 μ F,25V,Electrolytic
C126	RC-GZA226AF1C	J	AB	22 μ F,16V,Electrolytic
C129,130	RC-GZA475AF1E	J	AB	4.7 μ F,25V,Electrolytic
C131	VCKYBT1HB821K	J	AA	820 pF,50V
C153	VCQPKA2AA392J	J	AB	0.0039 μ F,100V,Polypropylene
C154	VCQYKA1HM273J	J	AB	0.027 μ F,50V,Mylar
C155	RC-GZA107AF1C	J	AB	100 μ F,16V,Electrolytic
C301~303	VCKYCY1HB102K	J	AA	0.001 μ F,50V
C304	VCKYCY1EB103K	J	AA	0.01 μ F,25V
C305	VCKYCY1HB472K	J	AA	0.0047 μ F,50V
C306	VCCUCY1HJ9R0D	J	AB	9 pF (UJ),50V
C307	VCKYCY1HB472K	J	AA	0.0047 μ F,50V
C308	VCKYCY1EF223Z	J	AB	0.022 μ F,25V
C309	VCKYCY1HB102K	J	AA	0.001 μ F,50V
C311	VCCCPA1HH100J	J	AA	10 pF (CH),50V
C312	VCCSCY1HL330J	J	AD	33 pF,50V
C313	VCCUCY1HJ6R0D	J	AB	6 pF (UJ),50V
C314	VCCCCY1HH220J	J	AA	22 pF (CH),50V
C315	VCKYCY1HB101K	J	AB	100 pF,50V
C316	RC-GZA106AF1C	J	AB	10 μ F,16V,Electrolytic
C317	VCKYCY1EF223Z	J	AB	0.022 μ F,25V
C318	VCCSCY1HL5R0C	J	AD	5 pF,50V

NO.	PART CODE	★	PRICE RANK	DESCRIPTION	NO.	PARTS CODE	★	PRICE RANK	DESCRIPTION
C319	VCCCCY1HH180J	J	AA	18 pF (CH),50V	C625	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic
C320	VCKYCY1HB102K	J	AA	0.001 μF,50V	C626	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic
C321	VCKYCY1HB332K	J	AA	0.0033 μF,50V	C627	VCKYCY1EF223Z	J	AB	0.022 μF,25V
C323	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C629	RC-GZV227AF1H	J	AC	220 μF,50V,Electrolytic
C329	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C630	RC-GZW338AF1H	J	AF	3300 μF,50V,Electrolytic
C330	VCCCPA1HH120J	J	AA	12 pF (CH),50V	C643,644	RC-QZA224AFYJ	J	AB	0.22 μF,50V,Mylar
C331	VCKYCY1EF473Z	J	AB	0.047 μF,25V	C647	VCKYBT1HB331K	J	AA	330 pF,50V
C332	VCKYPA1EF223Z	J	AA	0.022 μF,25V	C648	VCKYPA1HB122K	J	AA	0.0012 μF,50V
C334	VCCUPA1HJ270J	J	AA	27 pF (UJ),50V	C651	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C335	VCKYCY1HB561K	J	AA	560 pF,50V	C652	RC-GZA336AF1C	J	AB	33 μF,16V,Electrolytic
C337	VCKYPA1EF223Z	J	AA	0.022 μF,25V	C654	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C340	VCKYCY1HB102K	J	AA	0.001 μF,50V	C656-659	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C343,344	VCCSCY1HL330J	J	AD	33 pF,50V	C660	VCKYPA1HB102K	J	AA	0.001 μF,50V
C349	VCKYCY1HB102K	J	AA	0.001 μF,50V	C663	VCKYPA1HB821K	J	AA	820 pF,50V
C350,351	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C665	VCYFA1HA473J	J	AB	0.047 μF,50V,Thin Film
C352	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic	C670	RC-GZA107AF1E	J	AB	100 μF,25V,Electrolytic
C353,354	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C681	VCYFA1HA473J	J	AB	0.047 μF,50V,Thin Film
C355	VCCCCY1HH220J	J	AA	22 pF (CH),50V	C683	RC-GZV228AF1C	J	AG	2200 μF,16V,Electrolytic
C356	VCKYCY1HB102K	J	AA	0.001 μF,50V	C684	VCYFA1HA473J	J	AB	0.047 μF,50V,Thin Film
C357	RC-GZA225AF1H	J	AB	2.2 μF,50V,Electrolytic	C688	VCYFA1HA473J	J	AB	0.047 μF,50V,Thin Film
C358	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C689	RC-GZA474AF1H	J	AA	0.47 μF,50V,Electrolytic
C360,361	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C695,696	VCKYPA1HB102K	J	AA	0.001 μF,50V
C362	RC-GZA335AF1H	J	AB	3.3 μF,50V,Electrolytic	C701,702	VCCCCY1HH220J	J	AA	22 pF (CH),50V
C363	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C703,704	VCKYCY1EF223Z	J	AB	0.022 μF,25V
C364	RC-GZA475AF1E	J	AB	4.7 μF,25V,Electrolytic	C705,706	VCKYCY1HB102K	J	AA	0.001 μF,50V
C365	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C710	VCKYCY1EB103K	J	AA	0.01 μF,25V
C366	VCKYCY1HB102K	J	AA	0.001 μF,50V	C711	RC-GZA335AF1H	J	AB	3.3 μF,50V,Electrolytic
C367,368	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C712	VCKYCY1EB103K	J	AA	0.01 μF,25V
C369	VCCSCY1HL560J	J	AD	56 pF,50V	C713	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic
C370-372	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C714	VCKYCY1HB561K	J	AA	560 pF,50V
C373,374	VCTYPA1CX223K	J	AA	0.022 μF,16V	C715	RC-GZA107AF1A	J	AB	100 μF,10V,Electrolytic
C376	VCKYCY1HB102K	J	AA	0.001 μF,50V	C801	RC-GZA477AF1A	J	AC	470 μF,10V,Electrolytic
C378	VCKYPA1HB331K	J	AA	330 pF,50V	C802	RC-GZA476AF1A	J	AB	47 μF,10V,Electrolytic
C380	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic	C803	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C381	VCCCCY1HH120J	J	AA	12 pF (CH),50V	C804	RC-GZA476AF1A	J	AB	47 μF,10V,Electrolytic
C382	VCCCCY1HH150J	J	AA	15 pF (CH),50V	C805	RC-GZA226AF1A	J	AB	22 μF,10V,Electrolytic
C383	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C806	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C384	VCKYCY1HB102K	J	AA	0.001 μF,50V	C807	VCKYPA1HF334Z	J	AC	0.33 μF,50V
C385	VCKYPA1HF103Z	J	AB	0.01 μF,50V	C808	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C386	VCKYPA1HB331K	J	AA	330 pF,50V	C809,810	VCCSPA1HL820J	J	AA	82 pF,50V
C387	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C811	VCKYCY1HB101K	J	AB	100 pF,50V
C391	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic	C812,813	VCKYPA1HF273Z	J	AA	0.027 μF,50V
C392	VCKYCY1HB102K	J	AA	0.001 μF,50V	C814	VCKYPA1HB331K	J	AA	330 pF,50V
C393	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C815	VCKYCY1HB562K	J	AA	0.0056 μF,50V
C394	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic	C816	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic
C395	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C817	VCKYCY1EF103Z	J	AA	0.01 μF,25V
C396	RC-GZA107AF1A	J	AB	100 μF,10V,Electrolytic	C818	VCKYCY1HB181K	J	AB	180 pF,50V
C397	VCKYCY1EF223Z	J	AB	0.022 μF,25V	C819	VCKYCY1HB562K	J	AA	0.0056 μF,50V
C398	RC-GZA107AF1A	J	AB	100 μF,10V,Electrolytic	C820	VCKYPA1HF223Z	J	AB	0.022 μF,50V
C399	VCKYPA1HF223Z	J	AB	0.022 μF,50V	C821	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C401-408	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic	C823	VCKYPA1HB222K	J	AA	0.0022 μF,50V
C411,412	VCKYCY1HB331K	J	AA	330 pF,50V	C824	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic
C413	VCKYCY1HB102K	J	AA	0.001 μF,50V	C825	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C414	RC-GZA474AF1H	J	AA	0.47 μF,50V,Electrolytic	C827	VCYFA1HA104J	J	AC	0.1 μF,50V,Thin Film
C415,416	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic	C828	VCKYPA1HB561K	J	AA	560 pF,50V
C417,418	RC-GZA225AF1H	J	AB	2.2 μF,50V,Electrolytic	C829	VCKYCY1EF123Z	J	AA	0.012 μF,25V
C419,420	VCKYCY1HB272K	J	AA	0.0027 μF,50V	C830	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C421-424	RC-QZA104AFYJ	J	AC	0.1 μF,50V,Mylar	C831	VCKYCY1HB102K	J	AA	0.001 μF,50V
C425,426	RC-GZA106AF1C	J	AB	10 μF,16V,Electrolytic	C832	VCKYPA1HF684Z	J	AC	0.68 μF,50V
C429	RC-GZA336AF1C	J	AB	33 μF,16V,Electrolytic	C833	VCKYPA1HF334Z	J	AC	0.33 μF,50V
C430	RC-GZA107AF1C	J	AB	100 μF,16V,Electrolytic	C834	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C461,462	VCKYCY1HB562K	J	AA	0.0056 μF,50V	C835	RC-GZA107AF1A	J	AB	100 μF,10V,Electrolytic
C463,464	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C836	VCKYPA1HF334Z	J	AC	0.33 μF,50V
C468	RC-GZA107AF1C	J	AB	100 μF,16V,Electrolytic	C837	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C469	RC-GZA476AF1C	J	AB	47 μF,16V,Electrolytic	C838	VCCCCY1HH150J	J	AA	15 pF (CH),50V
C471,472	VCKYCY1HB332K	J	AA	0.0033 μF,50V	C841	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C473,474	RC-GZA475AF1H	J	AB	4.7 μF,50V,Electrolytic	C842	VCCCCY1HH150J	J	AA	15 pF (CH),50V
C475,476	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C843	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C601	RC-GZA336AF1C	J	AB	33 μF,16V,Electrolytic	C844	VCKYCY1HB272K	J	AA	0.0027 μF,50V
C602	RC-GZA105AF1H	J	AB	1 μF,50V,Electrolytic	C845	VCKYCY1HB102K	J	AA	0.001 μF,50V
C603,604	VCKYPA1HB101K	J	AA	100 pF,50V	C846	RC-GZA477AF0J	J	AB	470 μF,6.3V,Electrolytic
C605,606	RC-GZA475AF1E	J	AB	4.7 μF,25V,Electrolytic	C847	VCKYCY1HB272K	J	AA	0.0027 μF,50V
C607,608	RC-GZA227AF1E	J	AB	220 μF,25V,Electrolytic	C848	VCKYCY1HB102K	J	AA	0.001 μF,50V
C609,610	RC-GZA476AF1H	J	AB	47 μF,50V,Electrolytic	C849,850	RC-GZA106AF1H	J	AB	10 μF,50V,Electrolytic
C611,612	RC-QZA224AFYJ	J	AB	0.22 μF,50V,Mylar	C851	VCCCCY1HH121J	J	AA	120 pF (CH),50V
C613,614	RC-GZW228AF1V	J	AF	2200 μF,35V,Electrolytic	C857,858	VCKYCY1EF104Z	J	AA	0.1 μF,25V
C615	VCKYPA1HF223Z	J	AB	0.022 μF,50V	C859	VCKYPA1HF103Z	J	AB	0.01 μF,50V
C616	RC-GZW478AF1E	J	AG	4700 μF,25V,Electrolytic	C864	RC-GZA107AF1A	J	AB	100 μF,10V,Electrolytic
C620	RC-GZV477AF1E	J	AC	470 μF,25V,Electrolytic	C865	VCQYKA1HM222J	J	AB	0.0022 μF,50V,Mylar
C621	RC-GZA107AF1E	J	AB	100 μF,25V,Electrolytic	C867	VCCCCY1HH100J	J	AA	10 pF (CH),50V
C622	VCKYPA1HF223Z	J	AB	0.022 μF,50V	C901	VCKYCY1HB102K	J	AA	0.001 μF,50V
C624	VCKYPA1HF223Z	J	AB	0.022 μF,50V	C902	RC-GZA335AF1H	J	AB	3.3 μF,50V,Electrolytic

NO.	PART CODE	★	PRICE RANK	DESCRIPTION
C903	RC-GZA107AF1E	J	AB	100 μ F,25V,Electrolytic
C904,905	VCKYCY1HF223Z	J	AA	0.022 μ F,50V

RESISTORS

J920	VRS-CY1JB121J	J	AA	120 ohms,1/16W
J923	VRS-CY1JB121J	J	AA	120 ohms,1/16W
R7A0,1	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R7A2	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R7A3	VRD-ST2EE101J	J	AA	100 ohm,1/4W
R7A4	VRS-CY1JB121J	J	AA	120 ohms,1/16W
R7A5	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R7A6	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R7A7	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R7A8	VRS-CY1JB820J	J	AA	82 ohms,1/16W
R7A9	VRD-ST2CD332J	J	AA	3.3 kohms,1/6W
R7B0	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R7D1~6	VRS-CY1JB820J	J	AA	82 ohms,1/16W
R7D8,9	VRS-CY1JB820J	J	AA	82 ohms,1/16W
R7E1	VRS-CY1JB820J	J	AA	82 ohms,1/16W
R101,102	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R103,104	VRS-CY1JB121J	J	AA	120 ohms,1/16W
R105	VRS-CY1JB154J	J	AA	150 kohms,1/16W
R106	VRD-ST2CD154J	J	AA	150 kohms,1/6W
R107	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R108	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R109,110	VRS-CY1JB392J	J	AA	3.9 kohms,1/16W
R111,112	VRD-ST2CD222J	J	AA	2.2 kohms,1/6W
R113,114	VRS-CY1JB332J	J	AA	3.3 kohms,1/16W
R115,116	VRS-CY1JB153J	J	AA	15 kohms,1/16W
R117,118	VRS-CY1JB223J	J	AA	22 kohms,1/16W
R119,120	VRS-CY1JB101J	J	AA	100 ohm,1/16W
R121~124	VRS-CY1JB472J	J	AA	4.7 kohms,1/16W
R125	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R126	VRS-CY1JB562J	J	AA	5.6 kohms,1/16W
R131	VRD-ST2CD472J	J	AA	4.7 kohms,1/6W
R132	VRS-CY1JB472J	J	AA	4.7 kohms,1/16W
R133	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R134	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R138	VRD-ST2EE331J	J	AA	330 ohms,1/4W
R139	VRD-ST2CD272J	J	AA	2.7 kohms,1/6W
R140	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R141	VRD-ST2CD331J	J	AA	330 ohms,1/6W
R151	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R152	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R153,154	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R155	VRD-ST2EE560J	J	AA	56 ohms,1/4W
R156,157	VRD-ST2EE151J	J	AA	150 ohms,1/4W
R301	VRD-ST2EE220J	J	AA	22 ohms,1/4W
R302	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R303	VRD-ST2CD333J	J	AA	33 kohms,1/6W
R304	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R305	VRS-CY1JB681J	J	AA	680 ohms,1/16W
R306	VRS-CY1JB330J	J	AA	33 ohms,1/16W
R307	VRD-ST2EE470J	J	AA	47 ohms,1/4W
R308	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R309	VRD-ST2EE471J	J	AA	470 ohms,1/4W
R310	VRS-CY1JB472J	J	AA	4.7 kohms,1/16W
R312	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R313	VRS-CY1JB681J	J	AA	680 ohms,1/16W
R314,315	VRS-CY1JB330J	J	AA	33 ohms,1/16W
R316	VRS-CY1JB331J	J	AA	330 ohms,1/16W
R323	VRS-CY1JB683J	J	AA	68 kohms,1/16W
R336	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R350	VRS-CY1JB272J	J	AA	2.7 kohms,1/16W
R351	VRS-CY1JB562J	J	AA	5.6 kohms,1/16W
R352	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R353	VRS-CY1JB271J	J	AA	270 ohms,1/16W
R355	VRS-CY1JB332J	J	AA	3.3 kohms,1/16W
R356	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R357	VRS-CY1JB474J	J	AA	470 kohms,1/16W
R358	VRS-CY1JB822J	J	AA	8.2 kohms,1/16W
R359	VRS-CY1JB182J	J	AA	1.8 kohms,1/16W
R360	VRS-CY1JB472J	J	AA	4.7 kohms,1/16W
R361,362	VRS-CY1JB123J	J	AA	12 kohms,1/16W
R363	VRD-ST2CD332J	J	AA	3.3 kohms,1/6W
R364	VRS-CY1JB332J	J	AA	3.3 kohms,1/16W
R365	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R366	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R371~374	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R376	VRD-ST2CD103J	J	AA	10 kohm,1/6W

NO.	PARTS CODE	★	PRICE RANK	DESCRIPTION
R377	VRD-ST2CD562J	J	AA	5.6 kohms,1/6W
R379	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R380	VRD-ST2CD152J	J	AA	1.5 kohms,1/6W
R381	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R382	VRD-ST2EE331J	J	AA	330 ohms,1/4W
R383	VRS-CY1JB562J	J	AA	5.6 kohms,1/16W
R384	VRD-ST2CD682J	J	AA	6.8 kohms,1/6W
R385	VRD-ST2CD562J	J	AA	5.6 kohms,1/6W
R386	VRD-ST2EE331J	J	AA	330 ohms,1/4W
R387	VRD-ST2CD562J	J	AA	5.6 kohms,1/6W
R391,392	VRD-ST2EE391J	J	AA	390 ohms,1/4W
R393	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R395	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R405,406	VRS-CY1JB273J	J	AA	27 kohms,1/16W
R407,408	VRS-CY1JB152J	J	AA	1.5 kohms,1/16W
R410,411	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R412,413	VRS-CY1JB273J	J	AA	27 kohms,1/16W
R415~425	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R437,438	VRS-CY1JB682J	J	AA	6.8 kohms,1/16W
R439,440	VRS-CY1JB392J	J	AA	3.9 kohms,1/16W
R461	VRD-ST2CD822J	J	AA	8.2 kohms,1/6W
R462	VRS-CY1JB822J	J	AA	8.2 kohms,1/16W
R463,464	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R465,466	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R467	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R468	VRD-ST2EE331J	J	AA	330 ohms,1/4W
R469	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R470	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R471	VRS-CY1JB272J	J	AA	2.7 kohms,1/16W
R472	VRD-ST2CD272J	J	AA	2.7 kohms,1/6W
R473~476	VRS-CY1JB123J	J	AA	12 kohms,1/16W
R477	VRD-ST2CD123J	J	AA	12 kohms,1/6W
R478	VRS-CY1JB123J	J	AA	12 kohms,1/16W
R601,602	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R603,604	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R605,606	VRD-ST2CD820J	J	AA	82 ohms,1/6W
R607	VRD-ST2CD682J	J	AA	6.8 kohms,1/6W
R608	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R609,610	VRD-ST2EE3R3J	J	AA	3.3 ohms,1/4W
R613,614	VRD-RT2HD271J	J	AA	270 ohms,1/2W
R615,616	VRD-ST2CD472J	J	AA	4.7 kohms,1/6W
R617	VRS-CY1JB333J	J	AA	33 kohms,1/16W
R617A	VRD-ST2CD684J	J	AA	680 kohms,1/6W
R618	VRD-ST2CD684J	J	AA	680 kohms,1/6W
R619,620	VRD-ST2EE470J	J	AA	47 ohms,1/4W
R621	VRS-CY1JB223J	J	AA	22 kohms,1/16W
R623	VRS-CY1JB223J	J	AA	22 kohms,1/16W
R624	VRD-ST2EE102J	J	AA	1 kohm,1/4W
R625	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R627	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R628	VRD-ST2EE101J	J	AA	100 ohm,1/4W
R629	VRD-ST2EE102J	J	AA	1 kohm,1/4W
R634	VRD-ST2EE332J	J	AA	3.3 kohms,1/4W
R661,662	VRD-ST2EE331J	J	AA	330 ohms,1/4W
R685	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R686	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R702	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R705	VRD-ST2CD392J	J	AA	3.9 kohms,1/6W
R706	VRD-ST2CD472J	J	AA	4.7 kohms,1/6W
R707	VRD-ST2CD122J	J	AA	1.2 kohms,1/6W
R708	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R709	VRD-ST2CD562J	J	AA	5.6 kohms,1/6W
R710	VRD-ST2CD392J	J	AA	3.9 kohms,1/6W
R711,722	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R723	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R724	VRS-CY1JB123J	J	AA	12 kohms,1/16W
R725	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R727	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R728	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R729	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R731~734	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R737,738	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R739~741	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R742,743	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R744,745	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R746	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R747~750	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R751	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R753~756	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R757,758	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R759	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R762~768	VRS-CY1JB102J	J	AA	1 kohm,1/16W

NO.	PART CODE	★	PRICE RANK	DESCRIPTION
R774-777	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R778-780	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R781	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R782,783	VRS-CY1JB333J	J	AA	33 kohms,1/16W
R784	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R785	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R791,792	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R793	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R794	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R801	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R802	VRD-ST2CD224J	J	AA	220 kohms,1/6W
R803	VRS-CY1JB100J	J	AA	10 ohm,1/16W
R804	VRD-ST2CD330J	J	AA	33 ohms,1/6W
R805	VRS-CY1JB101J	J	AA	100 ohm,1/16W
R806	VRD-ST2EE4R7J	J	AA	4.7 ohms,1/4W
R807	VRD-ST2CD393J	J	AA	39 kohms,1/6W
R808	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R809	VRS-CY1JB102J	J	AA	1 kohm,1/16W
R810	VRD-ST2CD752J	J	AA	7.5 kohms,1/6W
R811	VRS-CY1JB392J	J	AA	3.9 kohms,1/16W
R812	VRS-CY1JB222J	J	AA	2.2 kohms,1/16W
R813	VRS-CY1JB392J	J	AA	3.9 kohms,1/16W
R814	VRD-ST2CD222J	J	AA	2.2 kohms,1/6W
R815	VRD-ST2CD911J	J	AA	910 ohms,1/6W
R816	VRD-ST2CD274J	J	AA	270 kohms,1/6W
R817	VRD-ST2CD224J	J	AA	220 kohms,1/6W
R820	VRD-ST2CD623J	J	AA	62 kohms,1/6W
R822	VRD-ST2CD105J	J	AA	1 Mohm,1/6W
R823	VRD-ST2CD182J	J	AA	1.8 kohms,1/6W
R824	VRD-ST2CD123J	J	AA	12 kohms,1/6W
R825	VRD-ST2CD562J	J	AA	5.6 kohms,1/6W
R826,827	VRD-ST2CD183J	J	AA	18 kohms,1/6W
R828	VRD-ST2CD152J	J	AA	1.5 kohms,1/6W
R829	VRD-ST2CD472J	J	AA	4.7 kohms,1/6W
R832	VRS-CY1JB394J	J	AA	390 kohms,1/16W
R833	VRS-CY1JB104J	J	AA	100 kohm,1/16W
R836	VRD-ST2CD154J	J	AA	150 kohms,1/6W
R839	VRD-ST2EE101J	J	AA	100 ohm,1/4W
R844-846	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R849	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R850	VRD-ST2CD823J	J	AA	82 kohms,1/6W
R851	VRD-ST2CD105J	J	AA	1 Mohm,1/6W
R852,853	VRD-ST2CD392J	J	AA	3.9 kohms,1/6W
R854,855	VRS-CY1JB561J	J	AA	560 ohms,1/16W
R856	VRD-ST2CD473J	J	AA	47 kohms,1/6W
R857	VRD-ST2CD224J	J	AA	220 kohms,1/6W
R858	VRD-ST2CD104J	J	AA	100 kohm,1/6W
R862	VRD-ST2CD124J	J	AA	120 kohms,1/6W
R864	VRD-ST2CD271J	J	AA	270 ohms,1/6W
R866	VRD-ST2CD272J	J	AA	2.7 kohms,1/6W
R869	VRD-ST2EE1R5J	J	AA	1.5 ohms,1/4W
R874	VRD-ST2CD272J	J	AA	2.7 kohms,1/6W
R883	VRS-CY1JB561J	J	AA	560 ohms,1/16W
R884	VRS-CY1JB681J	J	AA	680 ohms,1/16W
R885	VRS-CY1JB561J	J	AA	560 ohms,1/16W
R886	VRS-CY1JB681J	J	AA	680 ohms,1/16W
R887	VRD-ST2EE101J	J	AA	100 ohm,1/4W
R889A,B	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R890	VRS-CY1JB475J	J	AA	4.5 Mohms,1/16W
R892	VRD-ST2CD123J	J	AA	12 kohms,1/6W
R893	VRS-CY1JB752J	J	AA	7.5 kohms,1/16W
R895-899	VRD-ST2CD102J	J	AA	1 kohm,1/6W
R901	VRD-ST2CD152J	J	AA	1.5 kohms,1/6W
R902	VRD-ST2CD563J	J	AA	56 kohms,1/6W
R903	VRS-CY1JB473J	J	AA	47 kohms,1/16W
R904	VRS-CY1JB271J	J	AA	270 ohms,1/16W
R905	VRS-CY1JB103J	J	AA	10 kohm,1/16W
R906	VRD-ST2CD152J	J	AA	1.5 kohms,1/6W
R907	VRD-ST2CD103J	J	AA	10 kohm,1/6W
R909	VRS-CY1JB183J	J	AA	18 kohms,1/16W
R910	VRS-CY1JB333J	J	AA	33 kohms,1/16W

OTHER CIRCUITRY PARTS

CFW601/A	QCNWN0504SJZZ	J	AB	Flat Wire,5Pin
CFW701/B	QCNWN0505SJZZ	J	AA	Flat Wire,2Pin
CFW704/CNS704	QCNWN0518SJZZ	J		Connector Ass'y,9Pin
CFW807A/B	QCNWN0509SJZZ	J	AB	Flat Wire,2Pin
CNP101	QCNCM070HSJZZ	J	AC	Plug,8Pin

NO.	PARTS CODE	★	PRICE RANK	DESCRIPTION
CNP301	QCNCM042CSJZZ	J	AB	Plug,3Pin
CNP604	QCNCM010NAWZZ	J	AC	Plug,13Pin
CNP605	QCNCM999FAFZZ	J	AE	Plug,6Pin
CNP651	QCNCM998BAFZZ	J	AC	Plug,2Pin
CNP652	QCNCM062BSJZZ	J	AB	Plug,2Pin
CNP653	QCNCM998BAFZZ	J	AC	Plug,2Pin
CNP680	QCNCM999BAFZZ	J	AD	Plug,2Pin
CNP702	QCNCM071KSJZZ	J	AC	Plug,10Pin
CNP703	QCNCM010LAWZZ	J	AC	Plug,11Pin
CNP704	QCNCM068JSJZZ	J		Plug,9Pin
CNP707	QCNCM052CSJZZ	J		Plug,3Pin
CNP803	QCNCM932FAFZZ	J	AC	Plug,6Pin
CNS604	QCNCW010NAWZZ	J	AC	Socket,13Pin
CNS703	QCNCW010LAWZZ	J	AD	Socket,11Pin
CNW101	QCNCW0521SJZZ	J	AF	Connector Ass'y,8Pin
CNW651/CNS651	QCNCW0177SJZZ	J	AC	Connector Ass'y,2/2Pin
CNW652/CNS652	QCNCW0511SJZZ	J	AC	Connector Ass'y,2/2Pin
CNW653	QCNCW0148SJZZ	J	AD	Connector Ass'y,2Pin
CNW654	QCNCW0147SJZZ	J	AC	Lead Wire with Lug
CNW680/CNS680	QCNCW0556SJZZ	J		Connector Ass'y,2/2Pin
CNW702/CNS702	QCNCW0526SJZZ	J	AE	Connector Ass'y,10/10Pin
CNW707/CNS707	QCNCW0125SJZZ	J	AE	Connector Ass'y,3/3Pin
CNW801/CNS801	QCNCW0499SJZZ	J	AE	Connector Ass'y,9/8Pin
CNW802/CNS802	QCNCW0501SJZZ	J	AD	Connector Ass'y,8/7Pin
CNW803/CNS803	QCNCW0500SJZZ	J	AD	Connector Ass'y,7/6Pin
CNW805/CNS605	QCNCW0539SJZZ	J		Connector Ass'y,7/6Pin
CNW808A/B	QCNCW0520SJZZ	J		Connector Ass'y,4/4Pin
CNW901/CNS901	QCNCW0513SJZZ	J	AE	Connector Ass'y,7/7Pin
△ F651	QFS-D402BSJN1	J	AB	Fuse,4.0A/125V
△ F652	QFS-D162BSJN1	J	AE	Fuse,1.6A/125V
J601	QJAKM0001SJZZ	J	AG	Jack,Headphones
J801	VHPIF11381+-1	J	AM	Jack,Digital Out
LCD701	RV-LX0007SJZZ	J	AR	LCD Display
M901(217- 9)	9GD192112347	J		Motor with Pulley [Tape]
NM801	RMOTV0409AFM1	J	AN	Motor with Gear [Sled]
NM802	RMOTV0408AFM3	J	AN	Motor with Chassis [Spindle]
△ RLY681	RRLYD0004SJZZ	J	AG	Relay
RX701	VHLGP1U281X-1	J	AH	Remote Sensor,GP1U281X
SO401	QSOCJ0301SJZZ	J	AG	Socket,Video/AUX Input/Sub Woofers Out
SO601	QTANA0008SJZZ	J	AE	Terminal,Speakers
△ SO651	QSOCA0214AWZZ	J	AD	Socket,AC Input
SOL901(217- 4)	9GD192121118	J	AP	Solenoid Ass'y
SW700	QSW-Z0003SJZZ	J	AG	Switch,Rotary Type [VOLUME]
SW701	QSW-K0005SJZZ	J	AD	Switch,Key Type [POWER ON/STAND-BY]
SW702	QSW-K0005SJZZ	J	AD	Switch,Key Type [FUNCTION]
SW703	QSW-K0005SJZZ	J	AD	Switch,Key Type [STOP/CLEAR,TUNING DOWN]
SW704	QSW-K0005SJZZ	J	AD	Switch,Key Type [PLAY/CD PAUSE,TUNING UP]
SW705	QSW-K0005SJZZ	J	AD	Switch,Key Type [BASS/TREBLE]
SW706	QSW-K0005SJZZ	J	AD	Switch,Key Type [MEMORY/SET]
SW707	QSW-K0005SJZZ	J	AD	Switch,Key Type [REC/PAUSE]
SW708	QSW-K0005SJZZ	J	AD	Switch,Key Type [REW/PRESET DOWN]
SW709	QSW-K0005SJZZ	J	AD	Switch,Key Type [FF/PRESET UP]
SW800	QSW-F9001AWZZ	J	AE	Switch,Push Type [PICKUP IN]
SW801	QSW-P0004AWZZ	J	AE	Switch,Push Type [CD LID OPEN/CLOSE]
SW901(217- 7)	9GD640101210	J	AE	Switch,Leaf Type [Fool Proof]
SW902(217- 8)	9GD640101210	J	AE	Switch,Leaf Type [Cam]

CD MECHANISM PARTS

301	MLEVP1054AFZZ	J	AC	Rail,Guide
302	NGERH0586AFZZ	J	AC	Gear,Middle
303	NGERH0587AFZZ	J	AC	Gear,Drive
304	NSFTM0291AFFW	J	AD	Shaft,Guide
305	PCOVP1333AFSA	J	AF	Cover,Mechanism
306	PCUSG0613AFZZ	J	AC	Cushion
△ 307	DCTRH8004SJ01	J	BC	Pickup Unit Ass'y
307- 1				Pickup Unit
307- 2	MSPRC0961AFZZ	J	AA	Spring,Rack
307- 3	NGERR0043AFZZ	J	AC	Gear,Rack
701	LX-WZ1070AFZZ	J	AA	Washer,ø1.5×ø3.8×0.25mm

XL-55/55C

NO.	PART CODE	★	PRICE RANK	DESCRIPTION
702	XBBS20P03000	J	AA	Screw,ø2×3mm
703	XBSS26P06000	J	AA	Screw,ø2.6×6mm
704	XHBSD20P05000	J	AA	Screw,ø2×5mm
NM801	RMOTV0409AFM1	J	AN	Motor with Gear [Sled]
NM802	RMOTV0408AFM3	J	AN	Motor with Chassis [Spindle]
SW800	QSW-F9001AWZZ	J	AE	Switch, Push Type [Pickup In]
CABINET PARTS				
201	GCABB1107SJSA	J	AH	Rear Panel
202	GCABC1108SJSA	J	AK	Top Cabinet
203	GDORF0029SJSA	J	AG	Cassette Holder
204	GDORT0011SJSA	J	AK	CD Lid
205	GITAS0008SJSA	J	AG	Side Panel,Left
206	GITAS0009SJSA	J	AG	Side Panel,Right
207	HBDGA1002SJSB	J	AD	SHARP Badge
208	HDECQ0108SJSA	J	AF	Cassette Holder Window
209	HDECQ0110SJSA	J	AN	CD Lid Window
210	HDECQ0111SJSA	J	AF	LCD Window
211	HDECQ0112SJSB	J	AF	Ring,VOLUME Knob
212	HPNLC1069SJSA	J		Front Panel
213	JKNBK0030SJSA	J	AG	Knob,VOLUME
214	JKNBZ0080SJSB	J	AE	Button,Operation
215	JKNBZ0081SJSB	J	AE	Button,CD Eject
216	CGERH0001SJ01	J	AF	Damper Gear Ass'y
217	CMECB0013SJ01	J	BA	Tape Mechanism Ass'y
217- 1	9GD19210703	J	AE	Belt,FF/REW
217- 2	9GD19210943	J	AG	Belt,Main
217- 3	9GD192104310	J	AP	Pinch Roller Arm Ass'y
217- 4(SOL901)	9GD19212118	J	AP	Solenoid Ass'y
217- 5	9GD62161401	J	AN	Head,Erase
217- 6	9GD62010111	J		Head,Record/Playback
217- 7(SW901)	9GD640101210	J	AE	Switch,Leaf Type [Fool Proof]
217- 8(SW902)	9GD640101210	J	AE	Switch,Leaf Type [Cam]
217- 9(M901)	9GD192112347	J		Motor with Pulley [Tape]
217-10(PWB-D)	9GD192121303	J	AZ	Tape Mechanism PWB Ass'y
217-11(PWB-E)	9GD192121306	J		Tape Mechanism PWB Ass'y
218	LANGK0019SJFW	J	AB	Bracket,PWB
219	LCHSM0021SJFW	J	AH	Main Chassis
220	LHLDL002SJZZ	J	AD	Stabilizer
221	LHLDW1001SJZZ	J	AD	Nylon Band
222	LHLDZ1010SJSA	J	AE	Holder,LCD Display
223	LHLDZ1022SJSA	J	AB	Holder,LED
224	MLEVP0003SJZZ	J	AB	Lever,CD Eject Button
225	MSPRD0006SJFJ	J	AC	Spring,Cassette Holder
226	MSPRD0025SJFJ	J	AD	Spring,CD Lid
227	NGERH0001SJSA	J	AD	Damper Gear
228	PCOV3003SJFW	J	AD	Shield Cover
229	PCOV3004SJFW	J	AC	Shield Cover
230	PCOV3009SJFW	J	AD	Bracket,Terminal
231	PCUSG0003SJZZ	J	AC	Cushion,Leg
232	PMAGF0002AWZZ	J	AE	Magnet
233	PRDAR0017SJFW	J	AP	Heat Sink,Main
234	PSHEP0001SJZZ	J	AF	Sheet,LCD Display
△ 235	QFSHD0001AWZZ	J	AB	Holder,Fuse
236	TSPC-0403SJZZ	J		Label,Specification [Except for Canada]
236	TSPC-0404SJZZ	J		Label,Specification [For Canada]
237	LANGF0011SJFW	J	AH	Bracket,Heat Sink
238	LANGF0047SJFW	J		Bracket,Shield Cover
239	LANGT0001SJFW	J	AD	Bracket,Main PWB/CD Servo PWB
240	PCOV1001SJSC	J		Cover,Heat Sink
241	PCOV3010SJFW	J		Shield Cover
242	PRDAR0018SJFW	J	AH	Heat Sink,Transistor
243	QCWN0219SJZZ	J	AC	Lead Wire with Lug
601	LX-HZ0240AFFD	J	AB	Screw,Special
602	LX-JZ0001SJFD	J	AA	Screw,ø3×10mm
603	XEBSD25P10000	J	AA	Screw,ø2.5×10mm
604	XEBSD25P14000	J	AA	Screw,ø2.5×14mm
605	XEBSF25P08000	J	AA	Screw,ø2.5×8mm
606	XESSD30P10000	J	AA	Screw,ø3×10mm
607	XHBSD30P06000	J	AA	Screw,ø3×6mm
608	XJBSD30P08000	J	AA	Screw,ø3×8mm
609	XJBSF30P10000	J	AA	Screw,ø3×10mm

SPEAKER BOX PART

B3CPXL55 1	J	Speaker Box Ass'y,L-CH/R-CH
------------	---	-----------------------------

NO.	PARTS CODE	★	PRICE RANK	DESCRIPTION
-----	------------	---	---------------	-------------

PACKING PARTS (EXCEPT FOR U.S.A.)

SPAKA0141SJZZ	J		Packing Add.,Top
SPAKA0142SJZZ	J		Packing Add.,Bottom
SPAKA0152SJZZ	J		Side Pad,Set
SPAKC0268SJZZ	J		Packing Case [Except for Canada]
SPAKC0269SJZZ	J		Packing Case [For Canada]
SPAKP0042SJZZ	J	AC	Polyethylene Bag,Set
SPAKP0043SJZZ	J		Sheet,AC Cord
SSAKA0002SJZZ	J	AE	Polyethylene Bag,Accessories
TLABM0071SJZZ	J		Label,Pop
TLABN0282SJZZ	J		Label,Serial No. [Except for Canada]
TLABN0283SJZZ	J		Label,Serial No. [For Canada]
TLABRF254SJZZ	J		Label,Bar Code [For Canada]
TLABR1303SJZZ	J		Label,Bar Code [Except for Canada]
TLABZ0038SJZZ	J	AC	Label,Energy Star

ACCESSORIES

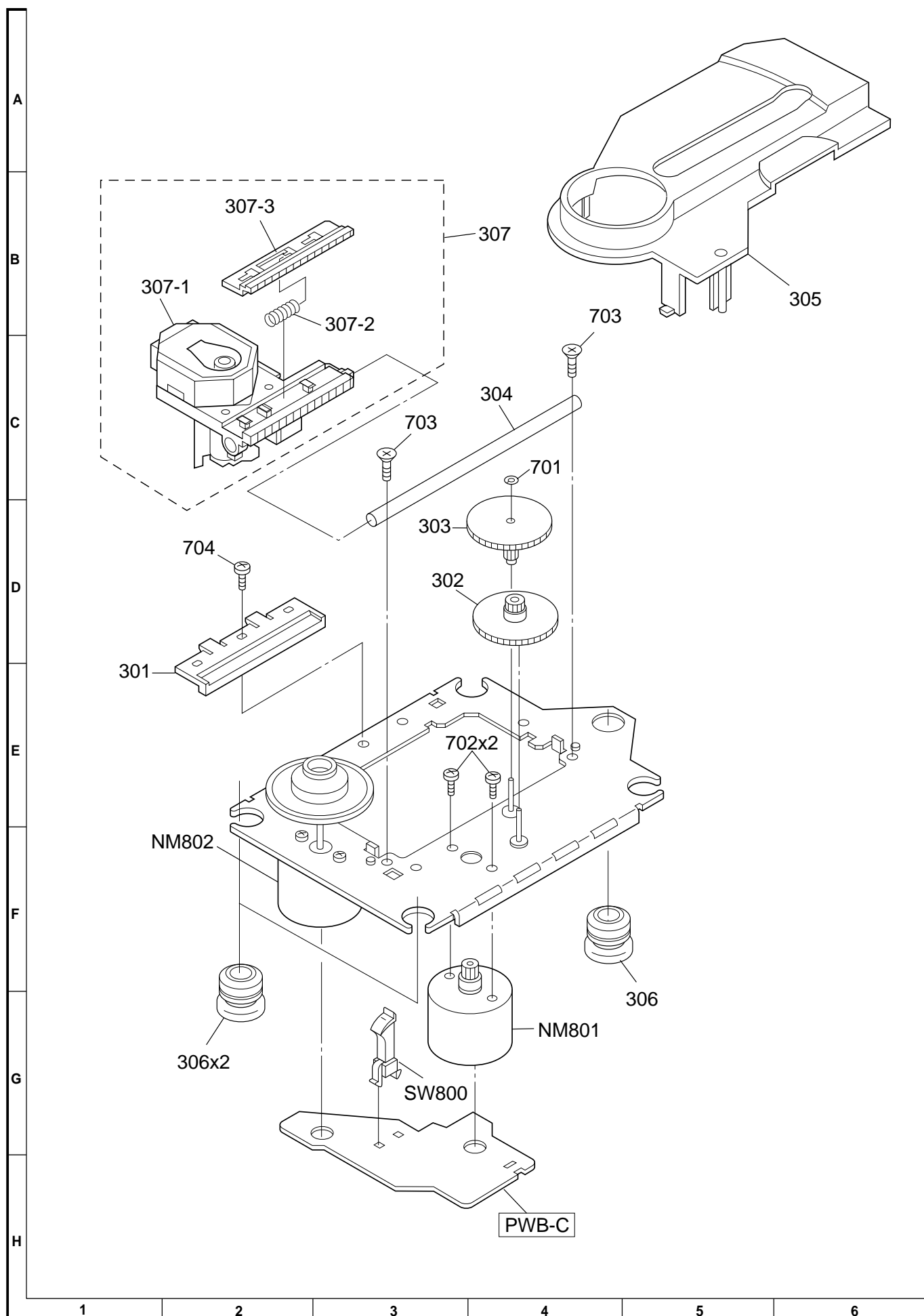
△ QACCU0003SJ00	J	AH	AC Power Supply Cord
QANTL0004SJZZ	J	AG	AM/FM Loop Antenna
TINSE0115SJZZ	J	AF	Operation Manual [Except for Canada]
TINSZ0178SJZZ	J	AD	Quick Guide [Except for Canada]
TINSZ0179SJZZ	J	AG	Operation Manual [For Canada]
RRMCG0059SJSA	J	AQ	Remote Control
GCOVA1028SJSA	J	AC	Battery Lid,Remote Control

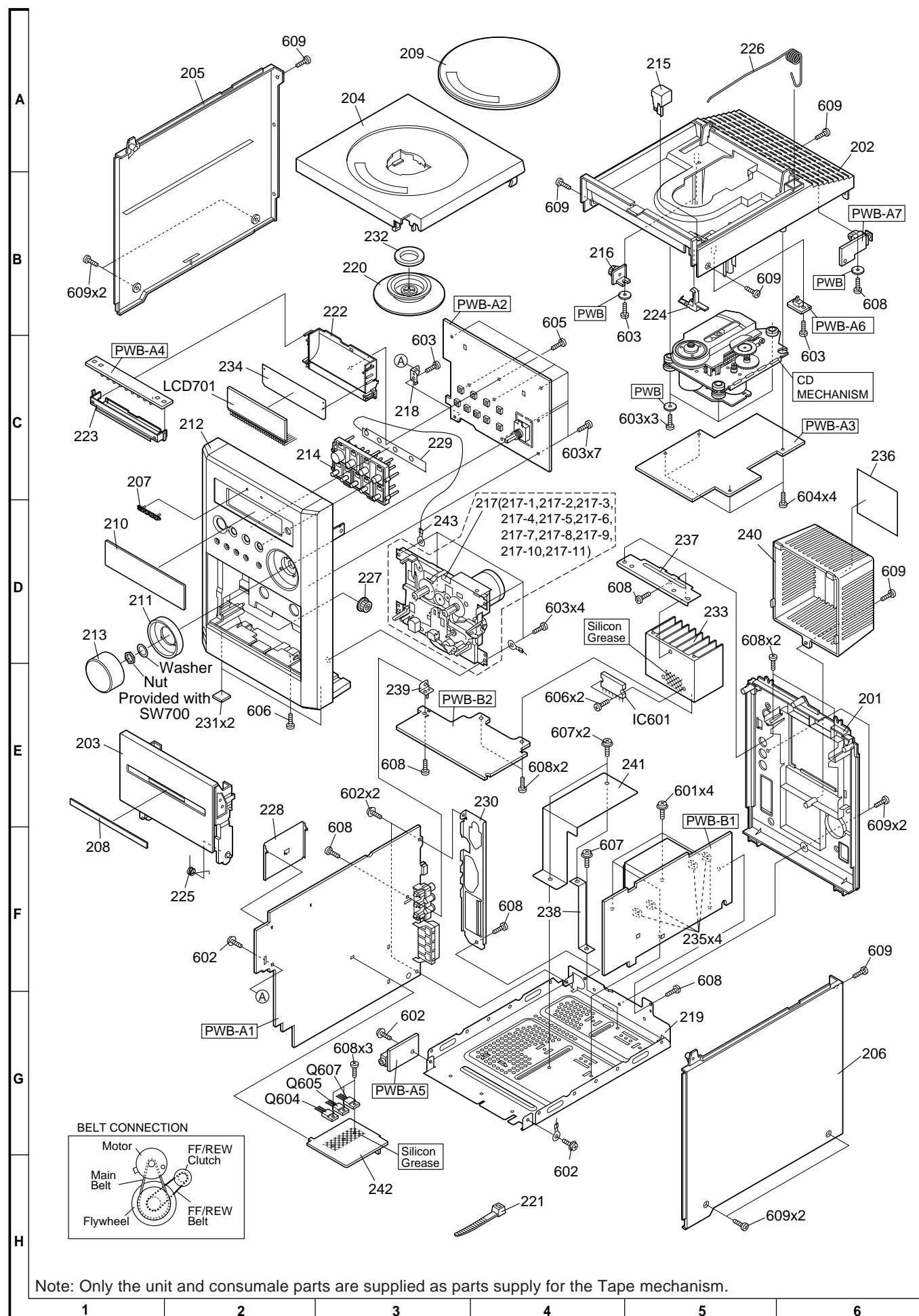
P.W.B. ASSEMBLY (Not Replacement Item)

PWB-A1~7	DCEKKV283SJ03	J	—	Main/Display/CD Servo/LED/ Headphones/Switch/Jac
△ PWB-B1,2	DCEKAV283SJ06	J	—	Power/Power Amp.
PWB-C	QPWBF3895AFZZ	J	AC	CD Motor (PWB Only)
PWB-D(217-10)	9GD192121303	J	AZ	Tape Mechanism PWB Ass'y
PWB-E(217-11)	9GD192121306	J		Tape Mechanism PWB Ass'y

OTHER SERVICE PARTS

UDSKA0004AFZZ	J	AZ	CD Optical Pickup Lens Cleaner Disc
---------------	---	----	--

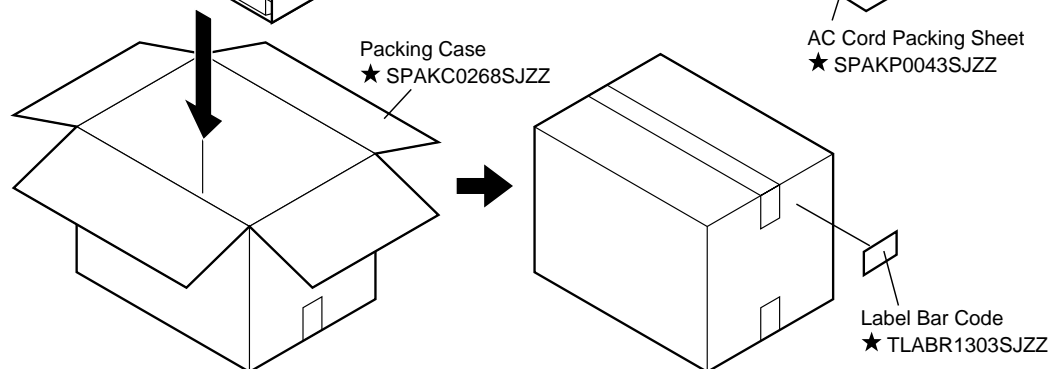
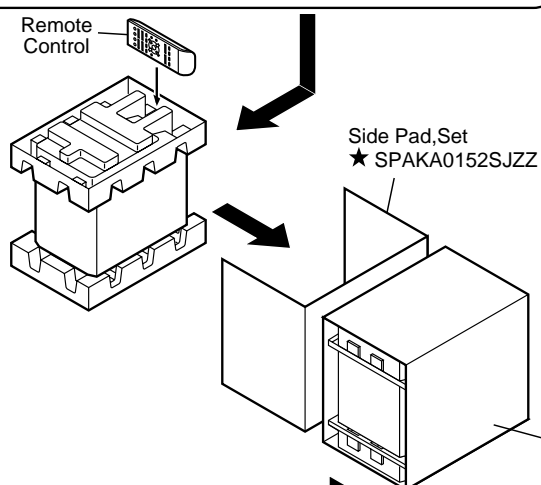
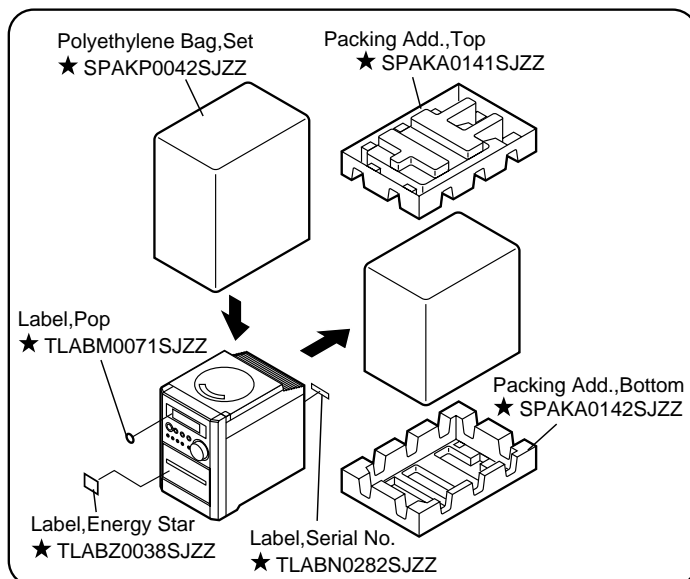




PACKING OF THE SET (FOR U.S.A. ONLY)

Setting position of switches and knobs

Tape Mechanism	STOP
Cassette Holder	CLOSE
CD Lid	CLOSE



★ : Not Replacement Item

XL-55/55C

—MEMO—

—MEMO—

SHARP

COPYRIGHT © 2003 BY SHARP CORPORATION

ALL RIGHTS RESERVED.

No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without prior written permission of the publisher.

SHARP CORPORATION
AV Systems Group
Audio Systems Division
Higashihiroshima, Hiroshima 739-0192, Japan
Printed in Japan

A0301-1455SS•HA•C

SC•SL